

BEFORE THE INDIAN CLAIMS COMMISSION

PUEBLO OF SANTO DOMINGO,)	
)	
Plaintiff,)	
)	
v.)	Docket No. 355
)	
THE UNITED STATES OF AMERICA,)	
)	
Defendant.)	

Decided: August 17, 1978

ADDITIONAL FINDINGS OF FACT

The Commission makes the following findings of fact, which are in addition to such of the 22 findings in our decision of May 9, 1973 (30 Ind. Cl. Comm. 259-281), as are applicable to the present plaintiff.

23. Rehearing on Eastern Boundary of Aboriginal Title Area.

On November 26, 1975, the Commission entered an order in this case which in pertinent part read as follows:

ORDER GRANTING MOTION FOR REHEARING

UPON CONSIDERATION of plaintiff's motion for rehearing and amendment of the Commission's findings, filed on July 25, 1975; defendant's opposition thereto, filed on October 6, 1975; plaintiff's reply, filed October 16, 1975; and the record in this case, the Commission is satisfied that the eastern boundary of the Santo Domingo aboriginal title area as delineated in the map accompanying the stipulation filed herein, 30 Ind. Cl. Comm. 234, 259-260, and incorporated into our finding of fact No. 2, E, at 30 Ind. Cl. Comm. 264, did not reflect the intent of counsel for the plaintiff, and that the foregoing inaccuracy occurred through inadvertence in describing the aforesaid boundary to the Bureau of Land Management, which prepared the map of the Santo Domingo aboriginal title area.

The Commission concludes:

- (1) That it has jurisdiction to relieve plaintiff of that part of the stipulation incorporated in finding No. 2, E.
- (2) That plaintiff may suffer substantial injustice if it is not so relieved.
- (3) That defendant has not shown it will suffer prejudice if plaintiff is so relieved.
- (4) That plaintiff's proposed amendment to finding No. 2, E, cannot be adopted by the Commission, because:
 - (a) Defendant has had no opportunity to present evidence on where the eastern boundary of tract E should be, and
 - (b) The proposed amendment is vague, not indicating whether or not it includes the ore bodies of the Tiffany and Cash Entry mines.

IT IS THEREFORE ORDERED:

1. That plaintiff's motion for rehearing be, and it hereby is, granted.

* * * * *

Accordingly, a trial was held on May 18-20, 1977, in which oral and documentary evidence was received on the question of the true eastward extent of plaintiff's area of aboriginal use and occupancy.

The plaintiff's proposed findings and brief were filed herein on September 1, 1977. The defendant's were filed on December 20, 1977, and the plaintiff's reply on May 2, 1978.

24. Description of the Claimed Area. The additional area claimed by plaintiff in this phase of the case adjoins the plaintiff's

prior aboriginal title award on the east and covers approximately 4,300 acres. The description is as follows:

From a point one mile due east of the southeast corner of the Los Cerrillos Grant run southwesterly to the southeast corner of Section 8, T. 14 N., R. 8 E.;

Thence southwesterly to Devil's Throne;

Thence northeasterly to Mt. Chalchihuitl;^{1/}

Thence northwesterly to the point at which the south boundary of the Sitio de Los Cerrillos Grant intersects a line projected from Turquoise Trading Post to Mt. Chalchihuitl;

Thence easterly along the south boundaries of the Sitio de Los Cerrillos Grant and the Los Cerrillos Grant to the southeast corner of the latter.

Thence one mile due east to the point of beginning.

No Spanish or Mexican land grants confirmed by the United States lie within the above area.

25. Turquoise Mines in Claimed Area. The plaintiff's claim to the additional area described in the preceding finding rests largely upon asserted aboriginal use and occupancy of what have been referred to as two turquoise "mines."^{2/} It is clear from the evidence, however, that the Indians are claiming use of two turquoise mining zones. This use of the word "mine" and its Spanish cognate "mina"

^{1/} This name was misspelled "Chalchihuntl" in our previous finding at 30 Ind. Cl. Comm. 264.

^{2/} The Tiffany and Cash Entry mines, named in the motion for rehearing and amendment of findings, were American mines opened in the late 19th century over earlier Indian and Spanish workings. The Cash Entry was not even a turquoise mine. See def. ex. 9 at 62, and finding 27, below.

in the sense of mining zone has precedent in older New Mexico usage. See pl. ex. 4 at 94, fn. 1, def. ex. 34 at 173.

The zones involved here are the Turquoise Hill in section 21, T. 15 N., R. 8 E., and the Mount Chalchihuitl in section 5, T. 14 N., R. 8 E., N.M.P.M. These and other localities in the neighborhood were worked for turquoise by prehistoric Indians and, in the late 19th and early 20th centuries, by white Americans. Pl. exs. 17 at 52, def. ex. 42 at 14.

The most remarkable turquoise mine in the area is the great pit on the southeastern slope of Mount Chalchihuitl. This was the site of the most extensive prehistoric mining operations on the American continent. Pl. ex. 18 at 52. W. P. Blake was probably the first American to publish a description of it. In 1858, he wrote as follows in the American Journal of Science (Vol. 22 at 277 -- pl. supp. ex. 51):

On reaching the locality I was struck with astonishment at the extent of the excavation. It is an immense pit with precipitous sides of angular rock, projecting in crags, which sustain a growth of pines and shrubs in the fissures. On one side the rocks tower into a precipice and overhang so as to form a cave; at another place the side is low and formed of the broken rocks which were removed. From the top of the cliff, the excavation appears to be 200 feet in depth and 300 or more in width. The bottom is funnel-shaped and formed by the sloping banks of the debris or fragments of the sides. On this debris, at the bottom of the pit, pine trees over a hundred years old are now growing, and the bank of refuse rock is similarly covered with trees. This great excavation is made in the solid rock, and tens

of thousands of tons of rock have been broken out. This is not the only opening; there are several pits in the vicinity, more limited in extent, some of them being apparently much more recent.

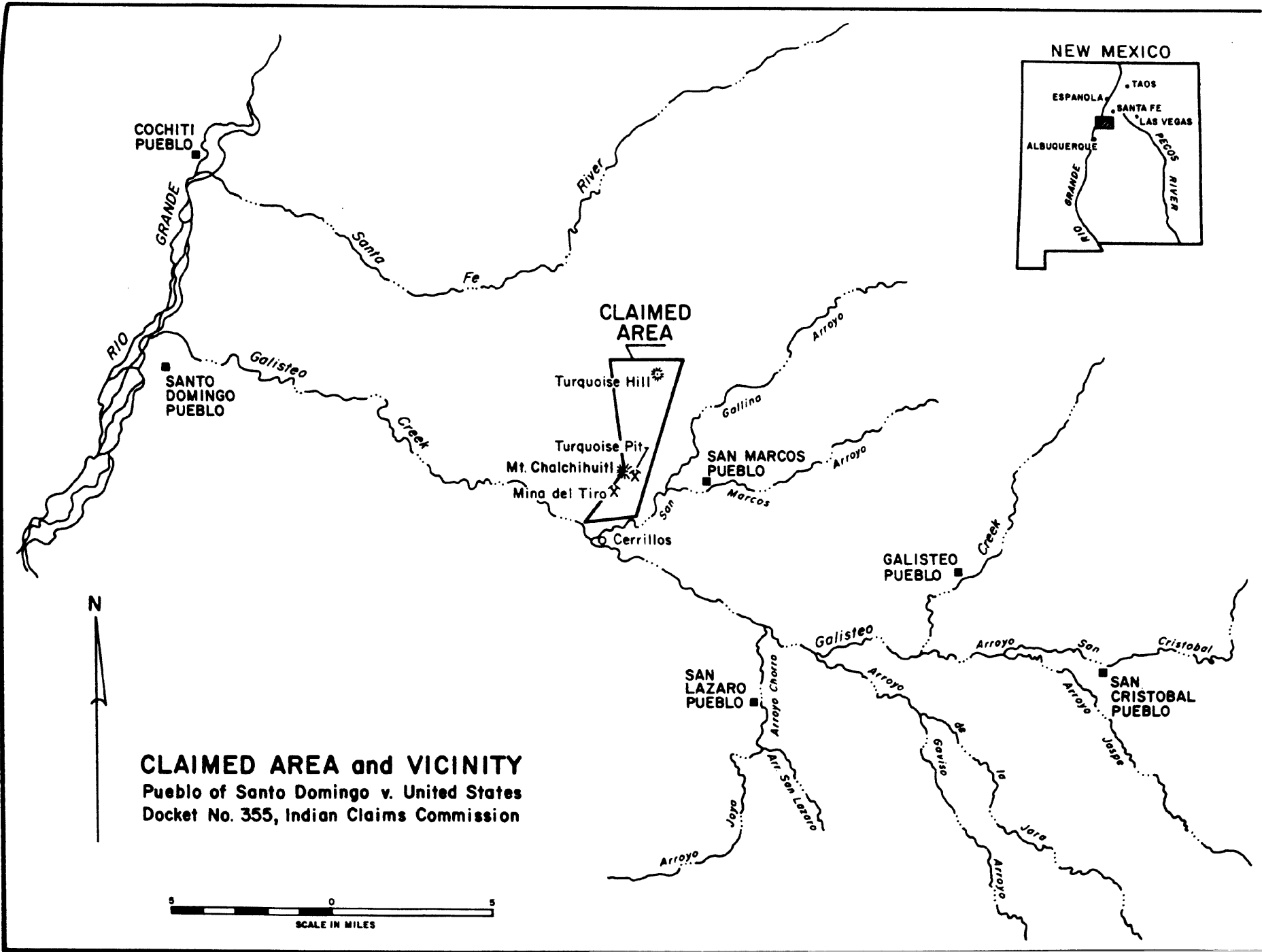
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The evident antiquity of this excavation, and its extent, renders it peculiarly interesting. Little or nothing appears to be known of it in that region, and I am not aware that it has ever been visited except by the Indians and New Mexicans. It seems hardly possible that such an amount of rock could have been removed by men without the aid of powder and machinery. The evidences were, however, conclusive that it was the work of the aborigines long before the conquest and settlement of the country by the Spaniards. It does not appear that anything has been done in the great pit for a long time. This is shown not only by the pine trees growing in it, but by the lichen-covered sides, and by the piles of rock, gray with age, around the margin. Fragments of ancient Indian pottery can easily be found among the rocks at all of the excavations. It is said that the Indians have a tradition that eight or nine of their tribe were once suddenly buried by a fall of rocks from the side of the great pit. Since that time they have been afraid to work in it. This is probable, and it is indicated by the condition of the locality.

Aboriginal mining of turquoise in the Cerrillos district is said to have begun more than 12 centuries ago. Activity in the claimed area was at its height between 1150 and 1650 A.D. The mining was commercial, and it was no minor market the stone hammers supplied. Blue gems were traded in incredible numbers to the Pueblos of Chaco Canyon in north-western New Mexico, to Arizona, to the Plains Tribes to the north and east, and into Mexico. Cerrillos turquoise supplied the pre-Columbian Aztecs and the Mayas of Yucatan. Pl. exs. 14 at 33, 16 at 529-530, 18 at 52, exs. 22, 25 at 23-25; def. ex. 47 at 35, 43; pl. supp. exs. 45, 46, 71.

The closest pueblos to the claimed area were Santo Domingo, Cochiti, San Marcos, Galisteo, San Cristobal and San Lazaro (see map on following page). The people of Santo Domingo and Cochiti speak the Keres (also spelled "Queres") language; those of Galisteo, San Cristobal, and San Lazaro spoke Tano, Tano being the southern division of the Tewa. Early Spanish observers and later American investigators do not agree among themselves on the language of San Marcos. Some state it was Tano, some Keres. The well-known 19th Century anthropologist, A. F. Bandelier, thought there were both Tanos and Keres in the pueblo. All the pueblos named above were abandoned during the Pueblo Revolt (1680-1694). When Spanish rule was reestablished, Santo Domingo and Cochiti were reoccupied. They still exist. Of the four more easterly pueblos, only Galisteo was repopulated. Drought, famine, disease and raids by wild tribes caused its final abandonment in 1792. Pl. ex. 4 at 92-93, 8 at 217, 12 at 267-270, 24 at 325-326, 339; def. exs. 3 at 102, 12 at 56; pl. supp. ex. 58 at xxxvii.

In the latter part of the 500 years between 1150 and 1650, at least, the majority of the turquoise mining in the claimed area was carried on by the Indians from San Marcos. The nearest pueblo to the great pit, San Marcos was located about 2 1/2 miles east of Mt. Chalchihuitl. Other Indians seem to have recognized that the San Marcos people held first claim to the valuable deposits of blue stone. San



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Marcos is called "Turquoise Pueblo" in the Tewa language; this probably was the Tano name also. Pl. exs. 23 at 4, 26 at 27, ex. 43; def. ex. 22 at 55, 31 at 109, 42 at 13. There is only a scintilla of evidence that the Galisteo people mined turquoise after the abandonment of San Marcos. Pl. ex. 1 at 20-21.

There has been no large scale work by Indians in the great turquoise pit since the Pueblo Revolt. The traditional explanation, among Anglo-Americans, is some version of the following. This one is from J. L. Hayward, The Los Cerillos Mines (1880) (pl. ex. 10 at 4):

. . . This, so history states, is where the slide occurred, in the year 1680, that buried some twenty-five Indians. The Spaniards, making a requisition upon the neighboring Pueblo of San Marcos for more Indians, to take the place of those buried, were refused, perhaps from a superstitious fear. The Spaniards attempted to enforce their orders, whereupon the Indians revolted, and after a severe struggle, drove the Spaniards from the country. Several years later the Spaniards returned, but they have never re-opened or attempted to work the mines. There is a tradition that before the Indians would allow the Spaniards to return they obliged them to take a solemn oath never again to work the mines.

The legend is fiction. One notes how in 22 years the 8 or 9 buried Indians mentioned by Blake had grown to 25. Actually, the Spaniards had little interest in turquoise, and did not disturb its Indian miners. Pl. exs. 4 at 94, 16 at 531; def. ex. 3 at 93, 94, ex. 35 at 56; and see finding 27, below.

The truth is the great mine was exhausted, probably before the Pueblo Revolt. In 1880 one D. C. Hyde thoroughly explored the site, sinking shafts in the bottom of the main pit, on the summit of the hill, and on the southeast side, and tunneling out from them. Cavern-like excavations were found on each side. Many stone-age tools were encountered; one hammer, weighing several pounds, still had the handle attached. Numerous veins of turquoise one-eighth to 2 inches thick were found in one of the caves. Nevertheless, after the expenditure of thousands of dollars, the project proved unsuccessful. The ancient miners had not left sufficient values behind to pay for the work. Pl. exs. 14 at 33, 23 at 25; def. exs. 28 at 273, 48 at 1066-1067.

26. Other Early Mining In Claimed Area. In and around the claimed area numerous veins of lead-zinc ore occurred, associated with some silver and a little copper and gold. The Spaniards were interested in metalliferous minerals, particularly lead for bullets and silver for money, and they worked a number of these lodes. The Mina del Tiro in NW 1/4 sec. 8, T. 14 N, R. 8 E., within this claimed area, may be the first mine operated by Europeans in what is now the United States. It was worked for 1800 feet along the outcrop and to an unknown depth. Below the 125 foot level it is filled with water that cannot be sounded because of the stairstepped shaft. This shaft is broken by landings at 12 to 14 foot intervals, to

permit the miners to climb on notched poles, carrying the ore and debris on their backs on the upward trips. The Spaniards smelted the ore nearby in small furnaces constructed of stones cemented together with mud. Production was substantial. One account, of unverified reliability, states the Spanish owners paid \$300,000 in tithes on the Mina del Tiro, indicating \$3,000,000 worth of production.

Pl. exs. 10 at 5, 21 at 157; def. exs. 2 at 207, 12 at 227, 239, 17 at 28, 29, 18 at 118, 20 at 821, 829, 24 at 67, 28 at 30-31, ex. 60, ex. 61.

The record contains a copy of a mining concession dated June 2, 1763, from the Spanish Archives of New Mexico (def. ex. 52, document 865) for two veins of unnamed metals intersecting on the "south of the hill they commonly call the Chalchiguite."^{3/} This is the only Spanish title document in evidence of a mine fairly definitely within the claimed area. The concession was not confirmed by the United States, nor, so far as the record shows, even presented for confirmation. The lack of production records in the Spanish archives still preserved in Santa Fe suggests that much of the colonial mining was carried on illegally, to avoid paying royalties to the crown.

Pl. ex. 23 at 30.

^{3/} This grant was clearly for the mining of metalliferous minerals. An ambiguous footnote in F. A. Jones, New Mexico Mines and Minerals (1904), at page 268, probably refers to this grant, and may have contributed to the mistaken belief that the Spaniards mined extensively for turquoise. See def. ex. 28 at 268, and cf. def. ex. 40 at 53 (Pogue-1915).

It was not realized until quite recently that the Indians worked lead mines in the area before the Spaniards arrived. From about 1315 to 1700 A.D., Indians of the Rio Grande area used lead ore to glaze pottery. In view of the tremendous amounts of glaze-decorated ware produced during this nearly 400 year period, prehistoric lead mining must have been extensive. Stone age tools, like those used in the turquoise pits, have been discovered in some Cerrillos lead mines. The Mina del Tiro and some 11 other mines in or near the claimed area are now believed to have originally been Indian-operated. The Spaniards seem to have wholly ousted the Indian from the metalliferous mines in the claimed area, for glazed pottery ceased to be made after about 1700; Bandelier, writing in 1892, called it a lost art. Pl. ex. 23 at 31; def. exs. 28 at 30, 42 at 25 (A. H. Warren Archeological Survey), 53 at 37, 41; pl. supp. ex. 49 at 185; def. reb. ex. 20.

All the mines in the claimed area except the turquoise mines were abandoned before the American era and most were backfilled, some as early as the Pueblo revolt. The primitive recovery technology of the Spaniards, which was capable only of creaming some of highest values out of the ore, and the remoteness of the mines from the market are probably sufficient to explain their abandonment. Pl. exs. 10 at 3, 5, 23 at 30-31, ex. 28; def. exs. 2 at 207, 34 at 172, ex. 61.

There was little or no mining in the claimed area, except for turquoise, during the period of Mexican rule (1821-1846). In fact, beyond the exciting strikes and rushes at the Old and New Placers, some 7 to 14 miles south of the town of Cerrillos, only one case of

intensive mining occurred in New Mexico during the years 1820 to 1860. That was at Santa Rita, far from the claimed area, in the southwest corner of the Territory. Pl. ex. 23 at 10; def. exs. 9 at 24-27, 27 at 5-6, 28 at 23-26, 34 at 173, ex. 52 (document 1162).

In 1866, twenty years into the American period, James F. Meline wrote from Santa Fe (def. ex. 34 at 170):

New Mexico is very rich, not only in metallic ores, but in mineral products not metallic. . . . considering the facility of reaching their deposits, and the incontrovertibly rich yield to be obtained from them, I cannot but wonder that they should be allowed to remain comparatively undisturbed, and almost unproductive.

There is no evidence before us of any beneficial use of the claimed area except by Santo Domingo Indians from the beginning of the Mexican period until 1865.

27. American Mining. In the year 1865 attempts were made to work the few metalliferous mines in and around the claimed area that had been left open. They were soon abandoned, owing to the area's remoteness from the outside world. All supplies had to be conveyed by freight wagons from the Missouri River, a distance of 800 miles. Pl. ex. 10 at 5.

The area remained undisturbed by Americans until January of 1879, when two prospectors from Leadville, Frank Dimmitt (or Dimick) and Robert Hart, an Englishman, came to the Cerrillos, took a few ore samples, and returned to Colorado. The assay on the samples started

a stampede. There were fully 1,000 locations made under the U. S. mining laws during the primary impulse of the excitement, perhaps half of them within the claimed area. By the autumn of 1880 five mining camps were in existence in the vicinity, with a total population of from twelve to fifteen hundred. Dimick and Hart's original camp, soon renamed Turquoise City, was inside the claimed area, in SW 1/4 sec. 32, T. 15 N., R. 8 E. Another of the camps was at the old village of Cerrillos, now called Cerrillos Station; the New Mexican and Southern Pacific Railroad had a depot there that served as shipping point not only for the Cerrillos mines but also for the Old and New Placers to the south.

Extensive shafts were sunk on only about 50 or 60 of the claims in the entire Cerrillos district. The Cash Entry, Grand Central, and Tom Paine mines were the most extensively developed and were credited with some production. The Cash Entry and the Grand Central were within the claimed area; and the Tom Paine was within Area E of the plaintiff's area of aboriginal occupancy described in our findings of May 10, 1973, 30 Ind. Cl. Comm. 234, 264-265. Pl. exs. 10 at 5-6, 23 at 11, ex. 43; def. exs. 27 at 10, 28 at 29, 31, ex. 58.

Besides the claims staked for silver and lead, beginning in 1879 or 1880 some hundred or more locations were made around the Cerrillos for turquoise. The richest proved to be clustered about Turquoise Hill, an elbow-shaped ridge rising from 100 to 300 feet

above the plains in sec. 21, T. 15 N., R. 8 E. It has four summits. The main summit is in the NW 1/4 SE 1/4 sec. 21. The others are about 250 yards S. 25° E., about 300 yards west, and about 500 yards S. 75° W., respectively. Americans found the principal turquoise deposits in the three lower hills. There were rather extensive ancient workings over the best deposits and in some places the greater part of the turquoise had been removed.

The famous Tiffany mine was situated in the southeast hill. Other claims were located around this mine, but only limited quantities of turquoise were found. The Old Castilian mine was situated on the westernmost hill, and around it numerous claims were located, accompanied by rather extensive prospecting. The openings on the third hill, lying north and east of this, were small and might be considered a part of those surrounding the Castilian mine. The American Turquoise Company bought six claims in the early 1890's, including those composing the Tiffany mine and part of the Castilian mine. Workings at the Tiffany consisted of numerous pits, open cuts, shafts, tunnels, drifts, and stopes. Some of the openings were ancient, and old stopes were encountered in the American tunnels. The ancient workings extended down as much as 100 feet. Pl. ex. 23 at 26, def. ex. 48 at 1069-1070, ref. map 7.

Despite D. C. Hyde's earlier unsuccessful exploratory work, Michael O'Neil and A. B. Renehan opened turquoise mines near Mount

Chalchihuitl in the early twentieth century. Def. Exs. 40 at 53, 48 at 1068-1069.

The mining boom of the Cerrillos Hills was short-lived. In 1904 Jones (op. cit. supra, n. 3) described the once thriving mining towns of the area as scarcely more than piles of rubbish and fallen walls. Some mining continued, but in 1911 Douglas B. Sterrett of the U. S. Geological Survey reported the turquoise mines of the area inactive. There seems to have been little mining of any kind since. Pl. exs. 9 at 46, 23 at 31; def. exs. 28 at 29, 42 at 18, 30, ex. 48 at 1068-1071; pl. supp. ex. 72.

There are many conflicting statements on turquoise production in New Mexico (pl. ex. 16 at 528). Conflicting indications of the profitability both of the turquoise mines and the metal mines are contained in this record. Production and profitability are not before the Commission at this stage of the case. While it is clear that there was some production and some profit, the Commission makes no quantitative findings on these matters.

The plaintiff's members' right to mine turquoise in the claimed area on a non-exclusive basis may have been recognized by the white miners for a time after the Americans overran it. After an incident in 1888 when unnamed pueblo Indians attempted to hold off the American Turquoise Company's manager with gunfire while they mined, the New Mexico Territorial Legislature enacted a law making it a penitentiary

offense for an Indian to enter a turquoise claim without permission of the current owner. The Indians, however, continued to mine surreptitiously; and despite some efforts at enforcement, there appear to have been few convictions. Pl. ex. 3, ex. 23 at 28-29.

28. Santo Domingo Tradition of Acquiring Title to Turquoise Area From San Marcos Pueblo. According to the Santo Domingo Indians who have testified orally in this case, Santo Domingo tradition is that the Keres-speaking Sun and Corn clans resided at San Marcos and mined turquoise in the claimed area. At unspecified times in the past, these clans left San Marcos, migrated to Santo Domingo, and became members of the Santo Domingo community. After they left, the Tano-speaking Isi clans continued to reside in San Marcos and carried on the turquoise mining. Finally the Isi, in two waves, also abandoned San Marcos and made their way to Santo Domingo, where their descendants still live. The Santo Domingo Indians contend that San Marcos owned the turquoise mines, and its survivors conferred the ownership on Santo Domingo when they migrated there and became members of the Santo Domingo community.

Adolph F. Bandelier, writing in the early 1880's, reported a similar but not identical tradition (Lang and Riley, ed. The Southwestern Journals of Adolph F. Bandelier 1880-1882, pl. ex. 15, def. ex. 31 at 109):

. . . Santiago told me that the pits of the Cerillos were made by the Indians of San Marcos, San Cristobal, San Lazaro, to whom these turquoise mines belonged. After they were driven out, they turned over the mines to the Queres.

In his Final Report of 1892 (pl. ex. 4 at 93) Bandelier wrote:

. . . The Tanos of Santo Domingo regard themselves as the owners of the site and visit it frequently to procure the stones that are so much esteemed by them. . .

There is today in Santo Domingo a Sun clan, to whom the turquoise mines are sacred, and a cane in that clan's possession in 1954 assertedly belonged originally to the San Marcos war chief. Tr. I-55; Tr. September 8, 1954, at 47.

The Santo Domingo Indians also have in their possession a very old painting on buffalo hide, which their expert witness, Florence Hawley Ellis, stated was of "Saint Cruz," and had been brought to Santo Domingo from Galisteo Pueblo (not San Marcos) by the Isi clan, in whose possession it still remained. See pl. ex. 1 at 13-17. What was probably the same painting is identified in testimony of Tomasito Tenorio, Governor of Santo Domingo, given in 1954, as "the patron saint, St. Mary, of the San Marcos church." Governor Tenorio further testified that after being brought from San Marcos it was first placed in the Santo Domingo church, but when that church caved into the river in about 1886 it had been rescued and turned over to the Sun clan, which had held custody ever since. See Tr. Sept. 8, 1954, at

47-49. Dr. Ellis identified the object near the saint's bosom or hand in the picture as a cross, Governor Tenorio as a sword. See pl. ex. 1 at 13-17, exs. 38a-f, 39; and cf. Luke 2:35.

29. Santo Domingo Use of Turquoise Mines. Indian mining of turquoise continued on a smaller scale after exhaustion of the great pit. Blake, in the continuation of the last paragraph quoted in finding 25, above, wrote:

. . . The place is, however, occasionally visited by Indians from a distance, but their operations appear to be confined to the surrounding openings, or to breaking up masses of rock which were formerly removed. The fragments which they procure are taken to one of the Indian pueblos on the Rio Grande, where the art of grinding and perforating them for beads is yet known. How this is accomplished, I could not ascertain. Two or three Indians, only, go to the locality at one time, and while there they live in the cave or recess in the face of the cliff.

James F. Meline, writing 8 years after Blake, stated (pl. ex. 68):

Turquoise, called by the ancient Mexicans Thalchuitl, and highly prized by them, is found in veins running through a light colored trachyte in the Cerillos, where exists the silver mine described in a preceding paragraph. It is greatly valued by the Indians, for ornament, and it is said that numerous moccasin tracks in the neighborhood of the mine show that it is frequently visited by them at night.

In 1880, the year after the American prospectors overran the claimed area, an unknown author wrote as follows on the back of a stereopticon view of the Cerrillos district (pl. ex. 28):

The old turquoise mine, now being operated by an enterprising person [presumably D. C. Hyde], is an immense work; especially so when a consideration is had of the rude facilities in use in the "booming times" of two hundred years ago. It is known that the Indians regard this mine, and the pretty blue pieces found there, with a kind of sacredness. . . These turquoise mines are said to be the only known ones in America. . . Only one or two out of many in this district are being worked just now, other than such as the Indians yet do of scratching with hands or sticks amongst old dumps for bits of bright color, which they prize as highly as their forefathers did.

In 1882, W. B. Sloan found Pueblo Indians working in the Mount Chalchihuitl pit and reported; "Knowing the Indians seem to think they have the right to this mine, and being at this time alone, I did not get any specimens." Def. ex. 59. Lucy Bacon wrote in the March 1933 issue of New Mexico magazine (pl. ex. 36 at 15):

Even today, though the mines have been under white domination for centuries, the Indians still visit them. Special significance is attached to the stones from this place.

Once in a while groups of Indians come to the site of the oldest of the holes and go through a ceremony which is closed to whites. About all that is known of it is that they drop prayer plumes in the hole.

The pueblo or tribe of the Indians mentioned in the foregoing articles is not identified. The "one of the Indian pueblos on the Rio Grande, where the art of grinding and perforating them [turquoise stones] for beads is yet known," referred to by Blake, however, is probably Santo Domingo. Bandelier wrote of Cerrillos turquoise

being perforated and polished at Santo Domingo in the early 1880's. Def. ex. 31 at 109. Professor Blake himself published another article in 1899, entitled Aboriginal Turquoise Mining, containing the following statement (pl. supp. ex. 50 at 282):

. . . Kunz records, on the authority of Major Hyde, who was exploring the Cerrillos locality in 1880, that the Pueblo Indians from Santo Domingo warned him that the mine was sacred, and that the turquoise (chalchuite) he was taking from it must not go into the hands of those whose saviour was not Montezuma.

Major Hyde was surely the same D. C. Hyde referred to in finding 25, above, whose intensive exploration work proved the great pit incapable of further commercial production.

Other documentary evidence of the American period expressly identifies the Indians mining in the claimed area as Santo Domingos. In addition to Bandelier, quoted in finding 28, above, Governor L. B. Prince of New Mexico wrote as follows in 1893 (pl. ex. 37):

. . . The neighboring Pueblo Indians of Santa [sic] Domingo Pueblo Village, had a knowledge of and trade in such 'Chalchuite' (their name for it, meaning about what we do in saying money) as they had kept from inheritances and by occasional finds in looking about these old mines, that they seem to think even now as a part of their monopoly.

The following article appeared in Southwestern Mines in November 1910 (pl. ex. 34):

Threatening him with death if he interfered with their plans of robbing the Tiffany turquoise mines, 14 miles south of Santa Fe, N. M., a band of Santa Domingo Indians approached the home of Manager J. P. McNulty and after leaving a guard of about 16 warriors

at the mouth of the shaft, descended the 125-foot shaft by means of a rope, ascending with some of the much sought for stone. Efforts have been made by Santa Fe officials to capture some of the band, but so far their chase has been in vain as Mr. McNulty is unable to identify any of those brought before him.

The Indians still claim the turquoise mines from which their forefathers took turquoise centuries ago, but the title is in the American Turquoise Company which the Tiffanys of New York are the principle stockholders.

In 1915 the Santo Domingos were called "for a long time the chief traders in the turquois from Los Cerrillos." Pl. ex. 30 at 82.

In 1935, Leslie White wrote in the Memoirs of the American Anthropological Association (pl. ex. 26, def. ex. 57 at 27):

The Domingo Indians manufacture a great deal of jewelry. They have easy access to the turquoise mines at Cerrillos. From a nearby mountain they get a whitish mineral which they use to make beads.

Elsie C. Parson in 1939 called Santo Domingo "the turquoise center" (pl. ex. 17).

Victor Garcia, 78, currently Governor of Santo Domingo, testified in the trial of this case that he and his father before him mined turquoise in the claimed area and that non-Santo Domingo Indians did not. He stated that the mines of the area had belonged to his people since before the time of Columbus. Tr. I-67-79. Santiago Lovato, a Santo Domingo Indian 88 years old, testified that he held an important position of a religious nature with his tribe, which required him to

be familiar with the boundaries of the Pueblo's lands as passed down from generation to generation. He stated that Mount Chalchihuitl and what is today known as the Tiffany mine were believed by the total population of Santo Domingo to be rightfully theirs. He told of going to mine several times when he was twenty years of age or younger, and on one occasion chiseling out and carrying away a 25 to 35 pound chunk of turquoise. He stated his father mined in the area before him and that the Mount Chalchihuitl mine belonged to the Santo Domingo Tribe before his father was born. Tr. I-82-101. Similar testimony was given by other Santo Domingo witnesses in 1953 and 1954. See Tr. 1953 at 15-18, 26-28, Tr. 1954 at 20-21.

There is also evidence in the record that other pueblos claimed the turquoise mines, and some evidence that the pueblos did not recognize village ownership of natural resources. David Snow, Curator of Archeology at the Museum of New Mexico, wrote as follows in 1973 (def. ex. 47 at 41):

The ownership of resource areas by individuals or by villages or other social groups was not a particularly well-developed concept among North American Indians. Feuds over ownership or use of resource areas, however, have been recorded between some California groups (Heizer and Treganza 1944). The extent of such contention elsewhere is not known. In the southwest, salt, like turquoise, was considered a precious commodity and its gift to the Pueblo Indians is sanctioned in mythological terms in much the same manner as turquoise.

Harrington (1916:535) was told that salt 'was not considered the property of any one tribe ... but the divine gift of Salt Old Woman, who gave herself freely. . .' Turquoise deposits probably were similarly considered. However, Santo Domingo Pueblo claims ownership of the Cerrillos pits through inheritance from the former Tanoan owners (Lange and Riley 1966:109, 142), as a result of the Pueblo Revolt of 1680 when the Galisteo villages were abandoned. The present eastern boundary of the Santo Domingo Pueblo Grant lies several miles west of the Cerrillos turquoise deposits and sheer propinquity may be the strongest basis for the Domingo attitude toward the Cerrillos turquoise deposits.

Informants in the 1930s stated that the following pueblos mined turquoise at Cerrillos: Santa Ana, Santo Domingo, Cochiti, San Felipe, and San Ildefonso. These same sources claimed that Zuni was not allowed access to the Cerrillos mines (Gifford 1941:125); however, Adair (1944:129) recorded that a Zuni Indian, on a trading expedition to Santo Domingo in the 1890s, requested permission from the Domingos to mine turquoise at Cerrillos. The Zuni was referred to the Anglo owner of the mine in Santa Fe, and for five dollars was given permission.

In contrast to the foregoing, Bandelier wrote in his Final Report of 1890 (pl. supp. ex. 48 at 157):

Divided into petty communities, the Pueblo traded with his neighbor, or fought with him, as circumstances might dictate. Trading was simple exchange, for there was no money. The solemn dances served often as marts, where the people came to enjoy themselves and to barter. But the village Indian also made longer trips for commercial purposes. In 1540, the Pecos Indians came to Zuni with buffalo hides. The two extremes, west and east, possessed distinct commodities, which gave rise to commerce. Again, certain groups of villages in the very heart of New Mexico controlled natural resources coveted by others, and for their possession they bartered or wrangled. The Tanos held the veins of turquoise, or kalaite, at the Cerrillos, about twenty miles southwest of the present Santa Fe. A branch of the Tiguas and another of the Piros were settled in the neighborhood of the salt marshes. The Zunis enjoyed a similar privilege in being within a short distance of the Salines of the Carrizo. The Queres of San Felipe had in front of their

village large veins of mineral paint, valuable to the Indian for his pottery. Such and other natural 'treasures' were guarded as jealously as the limited power of their possessors permitted; they both divided the pueblos from one another at times, and held them together by the great tie of commercial intercourse.

An article from the Santa Fe New Mexican for December 19, 1910, tells of the arrest of four Cochiti Indians for unauthorized mining. The lead paragraph of the article states (pl. ex. 19):

The story of the removal of turquoise from the Tiffany mines by Indians who still feel that they have a right to the semi-precious stones used in the ceremonies appears to be anything but a myth. For years J. P. McNulty, in charge of the mines has been complaining that Indians stole the turquoise by night, especially on moonlight nights, but it was an extremely difficult task to get proofs.

An interview with one of the arrested Indians was reported as follows in the same article:

. . . 'My name it is Marcial Quintana,' said the Indian. 'I live at Cochiti. I go to Turquoise mines to get turquoise, that is true enough. We want turquoise. Indians from Santo Domingo bring us turquoise to Cochiti, that is true enough, but they ask big price for it. We hear this mine was open, and nobody watched it or care about it. We see sheriffs coming but not try to escape. We think we can get turquoise from mine which nobody watched.'

Asked if he thought that the Tiffanies had grown indifferent about their turquoise mines and were willing to let the Indians remove the stones, Quintana said that he did not think that the Tiffanies or anybody else cared if they went to the mine where they were captured.

An article in the New Mexican for March 10, 1911, reports that the Cochiti Indians were sentenced to nine months in the penitentiary

for stealing turquoise. The article further stated (pl. ex. 20):

The Indians use turquoise for ceremonial purposes and it has been practically impossible to get them to understand that the turquoise mines are no longer public property.

The Indians of both Cochiti and Santo Domingo were cautioned by Superintendent Crandall to keep away from the Tiffany mines but their fondness for the semi-precious stone got them finally into trouble.

The Tiffany mines have been closed down for some time in order to curtail the production. These mines near Santa Fe had supplied all the American turquoise the Tiffanys use in their famous jewelry.

Joseph E. Pogue, in his study entitled The Turquoise, 3 Memoirs of the National Academy of Science 52, fn. 6 (1915), wrote:

For a long period the Queres of San Felipe were the chief traders in the Cerrillos product.

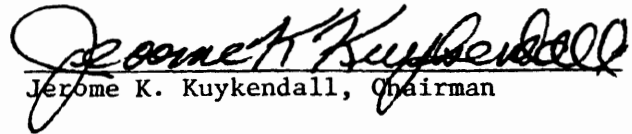
The Commission finds from a preponderance of the evidence that the Santo Domingo Indians had sole and exclusive use and occupancy of the turquoise mines in the claimed area at the beginning of the American period and for a long time prior thereto. The Commission further finds that such use and occupancy continued on a sole and exclusive basis until 1879 and on a non-exclusive basis for a long time thereafter.

30. Other Santo Domingo Use of Claimed Area. Both turquoise mining zones are Santo Domingo religious shrines. Tr. 1953 at 26, 28; Tr. 1954 at 53. The mining zones were also within the Santo Domingo traditional horse pasture, which continued to be used until

the late 1930's. Tr. 1953 at 35, Tr. 1954 at 21. Plaintiff's exhibit number 2, a map placed in evidence during the 1954 proceedings, shows both zones within the pueblo's customary use area, and approximates the eastern boundary shown on joint exhibit No. 1, the map prepared by the Bureau of Land Management for the 1977 trial.

Conclusion of Law

Based upon the foregoing findings of fact, Nos. 23 through 30, the Commission concludes that the area described in finding 24, above, lying to the east of the aboriginal title area heretofore found to belong to the Pueblo of Santo Domingo, was also owned by the Pueblo of Santo Domingo under aboriginal title at the beginning of American sovereignty over New Mexico and for an undetermined time thereafter.


Jerome K. Kuykendall, Chairman

John T. Vance, Commissioner


Richard W. Yarborough, Commissioner


Margaret H. Pierce, Commissioner


Brantley Blue, Commissioner