

last night. My attention is constantly on the stretch for the smallest things. I have to order, and then see that it is done. There is a wonderful amount of stolidity, ignorance, negligence, and obstinacy, which I have to contend against.

*November 2.*—Lieutenant Smith came up last night with the sheep, which this morning I found to be very poor; about half of them (lambs) almost worthless. His cattle, too, are much too poor. I marched before 8 o'clock. The Jornada was before me; here the river sweeps off to the southwest, mountains fill the bend, and the great trade-road passes to the south over an elevated plain, with a good road, but no water very near it, for 85 miles; half-way, it passes within five or six miles of a spring. Here the road I have followed crosses the river, and we turned to the right on the slightly broken tracks of General Kearny. In the wide bend to the left are several hundreds of the merchants' wagons: they are ruinously waiting the progress of events. It will one day be found out that they are not "Santa Fé traders," and that the breaking up of the lawless custom-house there has ruined their business. Behind me, within a mile or two, came Captain Burgwin's squadron, half mounted upon mules. On his march, near Luna village, some inhabitants came at speed to him, reporting that the Navahoes had just robbed them and taken off a woman, (the very incident that I apprehended, and wrote the Captain a letter in the village, to warn him of.) Capt. Greer's company, being much ahead, he was sent instantly to the rescue—his men half afoot. He overtook and recaptured the cattle and sheep, and, following on about sixteen miles, the mules of his company exhausted and left, and his men, following at long intervals on foot, the Captain, Lieut. Wilson, Corporal Price, and one private, (on horses got of the Mexicans,) overtook four Navahoes; then arose from a ravine fifty others, who surrounded the Captain and party. These killed two Indians outright, and then retreated in good order, under a shower of arrows, and were pursued, in their turn, a quarter of a mile, until they fell upon a few of their footmen, and thus came off unwounded. In this bottom, I saw a herd of many thousand sheep, and sent Mr. Smith with \$100 to purchase eighty, to make up for the lambs. I ordered him, if the owner was not there, as a case of necessity, to tell the foreman that we must have them, giving them a fair price—the same we gave yesterday. Of the guides sent me by the General, only Leroux joined me this afternoon; the others have come up to-night, more or less drunk. Weaver continues to improve, although very sick and feeble yet. Leroux said I had very poor animals to start to California: "not half so well fitted out to carry wagons as the General was." He asserts that it is twelve hundred miles, and at least ninety day's travel, from here. Very discouraging. It further appears, from his account, that it is perhaps four hundred miles from where we leave the river, seventy or eighty miles below this point, to where we can strike the Gila; this distance, for the most part, *unexplored and unknown by any of the guides.* I sent him forward in the morning, with all the guides but Charboneaux and Weaver, (sick,) to explore the plains beyond the point we leave the river, (perhaps not more than fifty miles,) and return to meet me there.

Mr. Smith got the eighty sheep, but I have now but little more than seventy-five day's of meat, (at  $1\frac{1}{2}$  pounds of beef to the ration,) or ninety days from Santa Fé, according to the General's advice, and will, if possi-

ble use about ten of the oxen for beef. Nothing is more certain than that if I had continued with no better outfit of mules than I received at Santa Fé, I should now be broken down. I have hired three Mexicans, and put the 380 sheep under their exclusive charge. I have this night commenced herding the whole of the mules, (and beeves, and oxen,) putting all of the sentinels, ten in number, to guard them exclusively. We passed this afternoon some very bad road. I found that we could improve on the track made by the regiment of dragoons, making about eleven miles. The camp is an open grove of the river bottom. We rejoice once more in plenty of fuel and good fires; for the last twenty-five or thirty miles the timber on the fine wide bottoms of the river has been quite a striking feature in the landscape, otherwise picturesque, with lofty mountains in every direction, blue from distance or haze, and capped with snow-fields. The weather is more moderate.

*November 3.*—Captain Greer, Lieutenant Wilson and Mr. Houck, visited us this morning. Captain G. confirms the statement of his skirmish with the Navahoes, and praises Lieutenant Wilson. By a person who left Chihuahua October 14th, a paper of that city, of the 6th, has been received, containing an account of Santa Anna's installation and his inaugural address; or, perhaps, a proclamation; in it he calls us "audacious and perfidious Americans," promises vigorous war, and to head the army.

This man confirms the report of a battle near Monterey, and gives some particulars, viz: that there were 5,000 Americans, that the Mexicans lost 1,300, killed and wounded; that during the battle other American forces took possession of the city, where, at the last accounts, they were invested by a superior Mexican force. There has been strong suspicions amongst the merchants down here of a conspiracy to rise and throw off the Mexican rule in this territory; connected, perhaps, at the moment, with the advance of seven hundred men, who certainly did march from El Paso north, and there is no doubt but they had emissaries or spies, and most likely, I think, above the Jornada. I learn that the volunteer who brought the report to Captain Burgwin of the arrival and news from the United States, also states, that at that time there was a talk in Santa Fé of the rising of the people. As for myself, I believe that the priests and a few of the millionaires, would like to put forward others to attempt to regain their despotic sway and grinding oppression of the people; but take them altogether I think the cowardly barbarians—too well off to have a decent government forced on them—are selfish enough to refrain from any risk in the world. I marched to day about fourteen miles; some bad bluffs of heavy sand were passed. The camp is on a high plain covered with gamma grass, apparently entirely dead, but *said* to be nearly as good as corn. For the last forty miles the flat river bottom occupies perhaps two miles in width, some of it richer than above. There is, however, a white efflorescence rather more frequent here than there, which is said to contain much carbonate of potash, and to render the soil unfit for agriculture. This district, entirely unoccupied, has the great superiority to that above, so thickly inhabited, of forests covering perhaps one-fourth of the bottoms, and the mountains also covered with cedar are very near. Fear of the Indians has made it a desert. A man of A company has died this evening; his death was very sudden; he walked to the surgeon's but this morning. The last two nights have been very cold, with severe frost.

To-day the sun was disagreeably hot. I have reduced the ration to 9 ounces of flour and 10 ounces of pork. At this rate I have 86 days. Our course to-day has been about S. W. Mr. Leroux left me this morning, with four other guides, to descend the river to the point, where it is practicable to leave it with wagons to explore beyond. After advancing several miles, I met one of the party that he had sent back ostensibly to settle upon signals by smoke, but really, I believe, because he had no use for him. This fellow, who weighs about 200, has been drunk for a week or two; his gun is broken past use. I have directed the assistant quartermaster to discharge him.

It took a cow and 12 of the lambs to make the rations to night. The lambs, not the smallest, I fear, weighed 18 pounds. We came in view this afternoon of a distant lofty mountain, running off to the east, from the range east of the great Chihuahua road; the Jornada, literally "days journey," which, far down, as far as we could see was an unbroken mass of snow. Dr. Foster, the interpreter, calls a bush which is pointed out to him the mezquite, the same bunch of a small growth is common on the Missouri and Platte prairies. I never could find out a name for it there. We passed cactus plants 10 feet high, and saw a specimen of an extraordinary variety, a bush of many small stems bearing long thorns, and also the usual fruit, covered with a full allowance of the minute pricklers.

*November 4.*—Marched at 8 o'clock; passed some very bad sand and stony hills; the men are distributed to the wagons, 15 or twenty to a wagon. Near 2 o'clock, as I sat on a hill watching the difficult ascent, two dragoons rode up, and in dismounting, the carbine of one went off and was very near hitting me. They handed me a letter from Captain Burgwin, to the amount that he had received information that some troops were coming from the south by way of the copper mines—it seems very improbable, but it is certainly possible—they may by this route attempt to surprize the traders' wagons. The last three miles of road were excessively bad; many steep ascents with loose stone and sand. I encamped near a great rock, where there is a small prairie of gramma grass; the march about eleven miles, which took from seven to eight hours of work, so hard that the teams can scarcely stand many such if in succession. This evening one of the party detached by Lieutenant Smith at the crossing, came up in four days, he says, probably six days, from Santa Fé. He brought no news at all. The report of the battle not yet confirmed; the infantry regiment not arrived, but expected daily. The captain, quartermaster, sergeant, and rest of the party, he reports, went back from Santa Fé by permission of Colonel Price. He reports Colonel Doniphan and his regiment on their march down within ninety miles of this point; said that Colonel Doniphan said he was going against the Navahoe Indians with a small part of his regiment, whilst the rest continued the march. The country to-day very broken, wild, and poor.

*November 5.*—This morning being stormy, and the draught animals very fatigued, I determined to rest to-day, having marched seventeen days without stop. I am told that a Mexican in Sonora will sometimes make powder in a day for use the next. There are said to be extinct volcanoes to the east, on the Organos range of mountains, beyond the Jornada road. Saltpeter is a very common efflorescence on the surface of the soil. About

sixty miles to the east of Albuquerque, and at a point one hundred and fifty miles to the south of it, are salt lakes, with a plentiful deposit of pure salt. The day turned out clear. I saved an ox with its shoulder out of place by staying to-day; it could not come up last night; to-day I sent for it, and had it slaughtered for beef, but although it weighed 400 pounds, it took sixteen of the commissary's lambs to make out the ration. I have ordered, in case of alarm at night, that the companies should turn out on the battalion parade ground, where they habitually form, and that all the teamsters, two to a team, should proceed to the assistance of the guard in securing the animals.

My camp is surrounded by a singularly broken and wild country, in the small open space near the mouth of a dry creek, lofty and irregular hills and bluffs jut in on three sides, and on the fourth is a narrow cottonwood bottom, and a high mountain rises from the opposite bank of the river, and their blue and white tops are visible in every direction. These hills are covered with the dry yellow gramma grass, and are dotted with cedars. On a little hill which juts into the camp, stands a large rock of square proportions, above 30 feet high, inaccessible in any part. It is a sandy conglomerate and precisely the color of the adobes; has a striking resemblance to the ruins of a church or other large building.

*November 6.*—Marched eight or nine miles over the gravel bluffs, incessantly up or down hill. I struck the river where the General crossed to a wide bottom in a semi-circle bend, and waited for his pack-saddles. Now we had our first practice at breaking a wagon road for a mile and a half round the bend of the river. I encamped at the lower end. The mules are herded half a mile up the flat ravine. The hills passed to-day are well clothed with gramma grass, but there is no bottom land for ten miles. The weather is becoming warmer by day and less cold by night. I shall march from here to-morrow, my twentieth day from Santa Fé, as did the General, (he having remained here three days.) The march was about eleven miles to-day, as much as can be well made over such a rugged country. Charboneaux, the guide, caught a fine large beaver on the river last night.

*November 7.*—We found a tolerable road four or five miles to-day, but then struck lofty hills of sand that were barely passable; the last, particularly, almost a mountain. The advance reached this camp near the river, after above six hour's march, scarcely eight miles, and the rear were near nine hours, being for the last two hours within a mile of the camp. There is every few miles a small bottom in the bend of the river; none other. Yesterday the weather was quite hot until near sundown; in the night water froze about a quarter of an inch in thickness. We have to-night plenty of cedar for fuel, also the mezquite bush. If the route should continue any great distance as difficult, no animals could stand it; mine are poor to commence. I had a pioneer party out; from ten to twenty men march with every wagon, pushing and pulling through deep sand and up hill with musket and knapsack on is very severe work. No animal is now ever staked. The country begins to look "outlandish;" the flickering fires to-night reveal around strange plants and bushes; the "Spanish bayonets" look like colossal statues with their cap of luxuriant leaves, and other nameless bushes we have seldom seen before. We have got among wild animals, turkeys, deer, and bears.

*November 8.*—It blew hard and rained last night and this morning until after sunrise. The animals, too, have had little rest from yesterday's excessive labor, when the teams were in some instances doubled. I marched at 9 o'clock, with the tents wet; the road is bad for three or four miles; the wind very high and cold. After five miles, I encamped on a second bottom, where there was plenty of gamma grass. It took many of the wagons from three to four hours to make this short march; it is very discouraging; there is not a loose mule now that is fit for work. Dr Sanderson and Mr. Hall who came ahead, have accidentally fired a cottonwood bottom a mile below this camp, and it is now burning with a great smoke. I fear that Leroux, the guide who is exploring, will, by his self-made convention, take it as a signal to return. Three nights ago a teamster lost a mule which he did not report until evening, so yesterday morning I sent him and his assistant back the day's march afoot; they came up last night without finding it. This morning a mule was found in a sand pit exhausted. I left two of the guard to allow it to rest, and endeavor to bring it up. A pair of wagon hounds were broken as we came into this camp. I have some spare ones. From the last hill top we had a view of another range of mountains off to the southwest; they are covered with snow, and the high wind blew directly from them; it is to pass around their southern point that we still continue on the river to the south.

*November 9.*—Leroux came back last evening; he went down about fifty miles, struck off where the river turns east at San Diego, and in fifteen miles found some water holes; then he saw from a high hill a creek running out of the mountain at an estimated distance of thirty miles; the next water, over a rather level plain. We marched early and had immediately to ascend an exceedingly difficult long hill, and so for four or five miles, winding very much, and just able to pass—very broken and difficult ground. At 2 o'clock the first wagons reached a good camping ground on the river, just where General Kearny struck off, and there I have encamped. It has now become evident to all that we cannot go on so, with any prospect of a successful or safe termination to the expedition. The guides say that most of the mules would not go to California driven loose. I examined the mules, and found that whole teams are poor, weak, and nearly broken down. The three ox-teams and wagons were to go back about this time, at the latest; three have already gone; twenty-two men are on the sick report; quite a number have been transported in the wagons, and the knapsacks and arms of others. Many of the men are weakly, or old, or debilitated, or trifling; besides all this, my rations are insufficient. I have, then, ordered that fifty-five of the sick and least efficient men shall return to Santa Fé, taking with them twenty-six day's rations of flour, at 10 ounces, and pork at half a pound. I shall thus get rid of 1,800 pounds weight of rations, and by means of what they leave, particularly the live stock, increase my rations for the remainder 17 days of meat and 13 of flour. But I have also determined to send back, if possible, only one team of oxen, so as to use on my mule-wagons the ten other yokes; this requires that the other two ox-wagons should be left here, which I have ordered; they can be sent for. Captain Burgwin is encamped about fifty-eight miles above. There are also some thirty extra mules, which some think to pack with 60 or 80 pounds, would do nearly as well as loose. I have also determined to pack, if possible, ten extra oxen, which are nearly

broken down, 200 pounds each. I have ordered the upright tent poles to be left, and muskets to be used as substitutes, and the tents to be reduced to one to nine men, (which they will hold if opened and lowered to the height of a musket.) This all accomplished, I hope, by patience, and perseverance, and energy, to accomplish the undertaking, though in a very few days I commence a route of above three hundred miles, to the San Pedro river, of which the guides know little or nothing—know not if there be water sufficient—Leroux thinking himself fortunate in finding water at an interval of thirty miles at the outset. No one doubts but that I could not have made this commencement of the march with the mules furnished at Santa Fé. The march undertaken is now said to be three hundred miles longer than then believed, and such is its true character; that making the road as we go, ten miles is sometimes a very hard day's march, equal to at least twenty-five miles of a good road.

*November 10.*—I was forced to remain in camp to-day. It took until near 3 o'clock to get off the party of fifty-five invalids, under Lieut. Willis, notwithstanding my constant efforts; 31 tents, 12 camp-kettles, 26 mess-pans, and 149 tent-poles have been put in one of the extra ox-wagons, and the two partially concealed. The two citizens, who came to take them back, were sent afoot to inform Captain Burgwin of the fact by to-morrow night; meanwhile, they are put in charge of a beaver trapping-party, who expect to be in the vicinity for eight or nine days. I have had the packs to-day prepared for mules and oxen, under the instructions of the guides and other Mexicans, and some of the animals packed in each company; so that it can be well done and early to-morrow morning. Weaver is getting well fast. Leroux, with two guides, Mr. Foster, the interpreter, (volunteer,) and one of the Mexicans hired to herd sheep—an excellent woodsman who has been on the Gila—go ahead early in the morning. They will explore beyond the point lately explored by Leroux, and return to meet me, or, what is better, send two back from there, and continue the exploration. Charboneaux's trap was sprung by a beaver last night, but it left a fore foot, and was missing.

*November 11.*—We encountered a very bad, rocky bluff this morning, within a mile of camp; otherwise meeting with less obstacles than usual, coming chiefly in river bottoms. After marching fourteen miles, I encamped on hilly ground, half a mile from the river, a woody bottom between, but standing water in a dry slough was found a quarter of a mile from the ground. Three more men went to join the party returning, two sick, and one as the only active and efficient man of the whole detachment—this makes 58. There was an evident improvement in our means to-day. Thirty-six mules were very lightly packed, besides some oxen; but still the last wagon was eight hours making the fourteen miles. Some of the packed oxen performed some antics that were irresistibly ludicrous, (owing to the crupper, perhaps,) such as jumping high from the ground, many times in quick-step time, turning round the while, a perfect jig! For the last eighteen miles we have found fine river bottoms, interrupted by points of bluff, on this side chiefly; for a mountain rises abruptly beyond. They are more than a mile wide, and, what is best, with much timber upon them—a wide strip invariably. We are in sight now of the point of mountain at El Paso.

The weather is fine; the country grows more flat; the bottom grass is dead, but good gamma grass on the bluffs. A deer and turkeys were killed to-day. A difficulty is, that I cannot encamp on a regular "bottom"—the grass being dead. This afternoon, while Charboneaux, (who is very active,) was making rather a remote exploration for water, giving it up, I came on a mile, guiding myself through weeds, willows, and reeds above my head, found water in a densely-timbered and brushy bottom, and established the camp on the bluff, with fine grass near. The tents are pitched with muskets, somewhat lengthened by a peg that enters the muzzle; the backs are opened, and a gore inserted, so that they are stretched out nearly into a circle, and are very capacious.

*November 12.*—Fifteen miles to-day, and a tolerable good road; it is very cheering. It has been a fortunate day: the pioneers were several times just ready for the wagons as they arrived, and I discovered that we had got into a "*cul de sac*" just in time to set the wagons right.

It is a difficult thing to hit grass and water, as the river generally has half a mile of tangle-wooded bottom on this side. I have done it to-night, after some perseverance and difficulty. There were fine rich river bottoms nearly all day. This forenoon we turned up on the bluffs, however, at a cañon, where there was a fine view of a rapid in the river below, and apparently a good pass through the mountains to the road on the other side—most probably where the "Jornado" road approaches within three or four miles of the river. If so, there the future road should fall into the one I make.

This morning I was awakened at 4 o'clock, with the report that horses had been crossing the river in the vicinity for half an hour. I had the mules, &c., driven closer; got up, and soon became convinced that it was the sound of rapids, or the water against snags. I heard it as a breeze came from the direction of the river. I sent a small party, however, into the bottom. I have calculated that I lightened the wagons above 20 per cent. by the late operation, whilst my rations were increased eight days; and it is confirmed by the facility of motion.

*November 13.*—After following the river this morning a mile or more, we found a pole and note from Leroux, but met at the same time two of the guides, who directed us to leave the river short to the right, stating it was fifteen miles to water. I followed a smooth inclined plane (between two bluffs,) three miles, and then had a steep ascent; then following ridges and making ascents occasionally, we reached another inclined bed of a rainy-weather stream. From this we wound up a long valley to a ridge which bound it, following that over a very rocky prairie. Charboneaux had gone to the head of the inclined plane, and found, he thought, an outlet. The water is at its head; but he did not return in time to direct all the wagons, and it is doubtful with me if it would have been better. The wagons arrived at this ground about an hour by sun, having come fifteen or sixteen miles, and all up-hill; the prairie being usually gravelly, and not rough. The water is about 100 feet lower than the camp, in a rocky chasm, difficult of descent for animals. The chief supply is a natural rock-bound well, thirty feet in diameter, and twenty-four feet deep. It contains about 55,000 gallons. Many feet below it are two smaller holes, which the animals can get at two or three at a time. There is no fuel, save a few bushes and Spanish bayonets. The country is well

covered to-day with gamma grass, and, also, I saw buffalo grass. We came over a high point, and had a fine view of the Organos and "El Paso" mountains, and the mound called "San Diego," where the river turns to the east. For a road coming up the river, there is a very fine valley, gradually ascending to this point. The course to-day, allowing for a variation of the needle of 12° E., was S. W. Some antelopes were seen.

*November 14.*—Expecting to march thirty miles (to the "Mimbres") without water, and after the hard and late march yesterday, I lay until near 10 o'clock, and cooked a ration; then all the animals were watered, and I got off twenty minutes after 11 o'clock. We proceeded in a direction 35° west of south; after a mile of ascent over rolling ground, we struck the margin of a vast plain surface extending indefinitely to the southwest, and slightly inclined towards us; after coming about four miles, we met one of the guides, who stated that Leroux was at a stream seven or eight miles more to our right, near the mountain range; that the "Mimbres" had not been found, &c. I then took his course, southwest, proceeded about five miles, where he bent more to the right, and finally, near a mile, short to the right into a valley where a stream running from the hills and mountains to the right loses itself in the sand. Nearly above is a fringe of timber, cottonwood, ash, &c. The prairie to-day was generally covered thick with large gravel, with intervals of clay, all well covered with grass, both gamma and buffalo, in places quite green and luxuriant. (We come through prairie dog villages, always found with buffalo grass.)

Thus Leroux, on his second trip, (or third, if he had attempted the exploration promised by the General,) has only reached about forty miles from the river! I have no guide that knows anything about the country, and I fear such exploring, as we go, will be very slow or hazardous work. Leroux goes to-morrow with six men, and he is to send back one every day's journey (for me) to meet me, (the going that day double,) until his party becomes too small. It is cold and cloudy, with a high southwest wind; some expectations of snow are entertained. Lofty mountains, distant and isolated, rise here and there from the great smooth plain I have mentioned. Such is the general characteristic, I am told, of Mexico.

The Mimbres, which I was lead to believe we would reach to-morrow, it is now thought by the guides may not be reached the day after. Just in the camp is apparently the foundation of a house; the stones, though large, are rounded; it rises a foot or two from the ground.

Close by, besides fragments of earthen pottery, is a broken mortar of a very hard red stone, resembling a burr stone; all the exterior is apparently in its natural rough state; there seems to be no other similar stone near.

*November 15—8 o'clock, a. m.*—The guides are behindhand; it rains a little, and there is no fuel at the next camping ground; there being good grass and fuel here, I have reluctantly concluded to lay by to-day; but I have no doubt of its being for the general advantage. Leroux, Mr. Hall, Dr. Foster, the interpreter, Charboneaux, and three Spaniards have gone, and I have urged the necessity of an active and more distant examination of the country.

*Evening.*—It has blown a gale all day, raining, snowing, and shining alternately. It is very cold, although the wind is but little west of southwest. I sent for an ox which was left yesterday, "given out," and had it

slaughtered, and, together with the smallest and poorest beef, issued as a ration; gaining thereby about a third of a ration. I have calculated now, at the rate of issue that we have, after to-day, ninety days of meat and eighty-six of flour.

*November 16.*—A clear cold day, with a high west wind, blowing directly from the snow in sight, on the low mountains, close to our right. Our course to-day south,  $15^{\circ}$  east, bending slightly to the right into a curve or shallow cove of the mountains; here, at their feet, after coming about thirteen miles, we find a small swampy hole of water, apparently insufficient, with plenty of black mud close to the surface. Many old Indian trails concentrate here, and the grass is unusually poor. The road to-day generally level, but with a few stiff rises and hollows to pass; country well covered with grass; the soil seems good, with less gravel and stones. Charboneaux has returned, and reports the gap just before us to be practicable, and that there is water six miles from here; he went with the others about twelve miles beyond it without finding other water. It was found to be about twenty miles round the point of the mountain to the south; and that way the guides went. Charboneaux reports favorably of the appearance of the country beyond the mountain; an open plain to the west, a little north. There is an irregular enclosure of rocks piled up (about three feet) on a hill near camp; probably a temporary defence of some of the Indians of the country. Very pretty, partially crystalized silicious cinders are very common. There is no wood, but with brush, Spanish bayonets, &c., we make out pretty well. I felt yesterday almost confident that we might have crossed the mountain to the west of our last camp, where Leroux has been twice exploring. This evening I am told that one of the men went over yesterday hunting, and reports it passable, (too late;) it would have saved much distance, and Leroux should have examined it.

*November 17.*—Another bright morning, with a cold northwester. I marched to the southwest, up a winding valley, and over the ridge, down to near the verge of the open prairie beyond; up a ravine to the right of the road (going to the north) is the water. In this mouth of the pass I was compelled to encamp a little after 10 o'clock, having marched only three miles, (which Charboneaux had called six.) We saw to-day a new variety of oak, a large luxuriant bush, eight to ten feet high, with leaves about an inch long; they are still very green; also, a new and very beautiful variety of the Spanish bayonet, very large and spherical in shape; the largest leaves near *three* feet long, and indented like a fine saw; with a stalk eighteen feet high from the centre. Tesson killed in the mountain two of the domestic goats, with cropped ears; they were very wild—stolen, I suppose, and then lost, by the Indians. I have been on a peak three hundred feet high; a view of our exact course was obstructed by a higher mountain close by; but in that direction, west, only slight and smooth (looking) elevations could be seen; but alas! where shall the water be found? To the south it is a vast level, from which irregularly rise conical hills, mountains, and short ridges, evidently from volcanic eruptions. This ridge was covered with brown sandstone, hard and fine. I saw there a flock of partridges of a new species; they are rounder, smooth, have longer necks, and a beautiful plume to the head, and are

slate-colored. Two new splendid varieties of the cactus are found here; one a solid hemisphere, with ridges and horny hooks 3 inches long; the other, with the leaf seven inches long, also round and ridged, but velvety and variable in color from pink and purple to nearly black.

*November 18.*—After a severe night, with a very high north wind, we had a bright calm morning. Water, however, froze solidly over in vessels after sunrise. One of the Mexicans, whom I hired as a shepherd, came back yesterday at 3 o'clock on foot, and reported the Mimbres eighteen miles distant. I marched this morning before eight; about two miles disengaged me completely of the defile, when we followed a course  $40^{\circ}$  north of west, over a tolerably smooth firm prairie, a little rolling and occasionally sandy, but generally a good soil. After making ten miles from a hill we saw the "Mimbres" timber  $25^{\circ}$  nearer the west, and down a smooth descent, apparently about five miles; we found it eight. I have observed that rising ground, particularly if it bounds your horizon, and descending ground are both very deceiving. In the first case, an object will appear more distant, and in the latter, much nearer than the reality. The prairie this afternoon is more gravelly, and covered with small stones. The wagons came in after eight and a half hours steady pulling. This is a fine, clear, bold stream, and is in places fringed with trees—amongst others, walnut, and with thickets of osiers, (whence its name;) it is a pleasant campground; but no guide is here for to-morrow. There is a mountain before us to the west, tapering to a distant point on the left, and sinking to a high ridge on the right; but where is water, or our most advisable course? Heaven knows! We are exploring an unknown region with wagons. It is believed that our camp three days ago is within a day's march—a long one; but the guide differs from me as to the direction of the gap; he thinks it northeast of this camp. The next traveller on this road, I hope, will pass the ridge at that camp, as my guides doubtless should have done, and cut off fifteen miles. There were thirty mortars found this morning cut into a solid rock for corn or ore.

*November 19.*—After a warm day, the sun blistering the face, water froze last night an inch thick. Dr. Foster, the interpreter, came in last night, and reported the Ojo de Vacas, on the copper mine and Yanos road, at eighteen or twenty miles. I marched this morning soon after seven o'clock, but in crossing the river an hour and a half was lost, and a second road was cut through the saplings and brush; a pair of wagon hounds were snapped off. Our course was  $25^{\circ}$  south of west. The prairie was pretty firm, and very little rolling; but the march was mostly an ascent, and we did not reach camp with the wagons until dusk; the mules were in harness eleven hours. Here there is only a little brush for fuel.

*November 20.*—It was exceedingly cold last night. Water froze in my hair this morning whilst washing. Leroux, Mr. Hall, &c., came in about 7 o'clock last evening. They report that they found a hole of water about ten miles in the direction of San Bernadino, (which they consider our course, and which is about  $30^{\circ}$  south of west;) that they went ten or twelve miles further without finding any indications of water. Having come thirty-six or thirty-eight miles in two days, I deemed it almost necessary to halt a day, in the condition of the mules. This morn-