

I was in high spirits on that June morning in 1905, as I left my farm home in southwest Missouri to board the train headed for faraway Wyoming, where a job on the Government survey awaited me. My older brother, Elmer, who had joined the survey outfit the year before had told me glowing stories of his work, living in tents, camping out in uninhabited areas, seeing new country almost every day, with game and other wild animals running about, and the prospect of such a life appealed strongly to me. Boarding the train, with my basket of fried chicken sandwiches, and with some extra money pinned inside my shirt, I left home on my first long journey. As the long Burlington train whistled its way westward across the plains of Kansas, Nebraska, and a corner of Wyoming the houses and fences kept getting farther and farther apart as we approached the open spaces of the West, until on the second morning I arrived at Toluca Junction, a red section house in the lonely sagebrush prairie thirty-five miles east of Billings, Montana. Toluca, which is on the Crow Indian Reservation, is where I changed trains onto the Cody branch line, which runs through the Indian Reservation on the way to Garland, Wyoming, my destination.

Getting off the train at Toluca, not a house could be seen, as I gazed at the low, sagebrush hills, this, and the fact that two families of Indians dressed in their native costumes were seen sitting flat on the ground in the station yard, made me realize that I had already arrived in the plains country. Talking in a low mumble, the Indians glanced furtively at another boy and me as we strolled rather timidly by. A squaw led her brood to the station water pump and proceeded to wash their faces, using her bare hands, then, not having anyone to pour water on her ^{own} hands, she washed her own face by filling her mouth with water and spewing it on her hands! At eight o'clock we all climbed aboard the mixed train, made up of several boxcars, a combination express and passenger coach, where we common passengers rode, while bringing up the rear was a Pullman sleeping car, which had been switched to this train at Toluca. Pulling our train was a small, squat, engine with a large flaring smokestack, puffing clouds of coalblack smoke, which appeared sort of out of place in the clear Montana air. Indians were permitted to ride free on trains crossing their Reservation, and this morning they appeared to be taking full advantage of the privilege, whole families piling on and off at every stop. The railroad being rather new, the novelty of a train ride had not worn off; thus giving^{me} a good opportunity to closely observe the Indians on their home grounds. The Indians were friendly in their quiet way, and attending strictly to their own affairs. The bucks usually led the family by walking solemnly ahead followed dutifully by the squaws and the children, who were especially respectful, quiet, and attentive. The bucks usually wore a dark coat, varied colored leggings, a wide brimmed black hat with a high crown, from which two or

three large eagle feathers dangled in the breeze, and from under which their long black hair hung in two braids. Bright colored blankets, thrown over the shoulders, a scarf on their heads, and beaded moccasins reaching 12 inches high on their legs, were worn by the squaws. Mothers with papooses had them strapped tightly to a papoose board slung on the mother's back, facing the rear. The infants, displaying no objections to being restricted in their movements, gazed solemnly at those, who followed behind.

The thrilling experience of feeling that I was actually on the real frontier, gripped me as I gazed out the car windows as the slow train crawled across this virgin grass-land, where, from horizon to horizon, not a fence or plowed field marred the unbroken landscape. An occasional group of teepees, nestling along the brushy creeks, pinto ponies grazing nearby, enhanced this overall impression of being in the midst of an untamed land. Why! A herd of shaggy buffalo might be grazing peacefully just over the distant skyline!

We soon entered Pryor Gap, where I received my first close view of the mountains, the Pryor Range, which here consists of thick tiers of light-gray limestone ledges and cliffs, one above the other, separated by rocky, timber covered, slopes. This famous defile, according to legend, served as a natural passage way for ancient tribes, who travelled north and south between the mountain valleys to the south, and the grassy buffalo country to the north. Strengthening the theory that this was an ancient passage way is the presence of a line of prehistoric stone mounds, found at regular intervals throughout the length of the gap. The great age of the monuments, which were about ten feet in diameter, by three feet high, was indicated by the stunted, gnarled, cedars now growing on them.

Seeing so many new and interesting sights on this last leg of my journey had whetted my anxiety to see, as quickly as possible, the place where I was to work the next few months. About three o'clock in the afternoon the engineer blew the whistle signaling the approach to Garland, rushing to the window as the train rounded a long curve, going into town from the northeast. I got a glimpse of the main business section, which consisted of a half-dozen white frame store buildings on the west side of the main street, which ran northward for about an eighth of a mile from the red depot. On the east side of the main street were a livery stable, feed yards, and some warehouses. The newness of the town, which was only three years old, impressed me, in comparison with the old rundown sections of the towns I had just passed through in the midwest. Upon leaving the train I noticed, just south of the railroad siding, a high railroad trestle and coal chute for use in refueling train engines. Mr. Norton, the station agent, informed me that just south of this trestle was the Brunt Survey camp where I was headed. Taking my baggage I walked under the trestle to the largest one of a group of tents, where I found Miss Rhoda Huber, the camp cook, busy in the cook tent. Rhoda, a friendly girl in her twenties, extended a hearty welcome, saying they were expecting me, which was good, reassuring news for me in this strange land.

Miss Huber informed me that the men, who were all in the field, would return to camp in time for supper, an event that I was looking forward to with much pleasure. The fragrant smells floating up from the roasting beef in the oven, and the freshly baked 'light' bread on the table, had already convinced me that I liked my new temporary home. This canvas kitchen, a most important adjunct to any survey camp, being provided with a home-made cupboard, or mess-box, set on boxes in the back of the tent, and a sheetiron cook stove in front,

the lid forming the cook's work table, with such table and cooking ware as were needed to prepare meals for the large crew of men. Lights for the camp were furnished by tallow candles placed where they would do the most good, many of them being stuck on the tops of catsup bottles. Drinking water, not only for this camp, but also for the whole town of Garland was brought in in tank cars by the railroad company, where it was available for all.

The purpose of this cadastral survey, which these surveyors were making was to divide this unoccupied public domain land into townships and sections, the first step necessary in the task of bringing irrigation water to this parched land, and making it available to prospective farmers.

The camp came alive when the field men, about twenty in all, walked into camp after their long day spent in the hot desert, and seemingly everyone was trying to talk at once, relating their experiences of the day, while washing up for supper. The meal, which seemed one of the best and most satisfying ones I had ever eaten was served 'roundup' style, as were all camp meals. After supper my brother showed me where I should sleep in one of the bunk tents pitched nearby. I rolled out my bedroll on the bare ground, as did everyone else in camp, then bedded down for my first night in camp, serenaded by lonely coyotes barking, yapping, and howling in every direction. I found that three or four of these wiley animals, by biting their long drawn out howls into small pieces could deceive one into believing there were at least a dozen of them. In those days each employee had his own bedding, towels, toilet soap, and such other toilet articles as required. The personal baggage was limited to such articles as could be carried in a bag or seamless sack

called a 'warbag', all suitcases and trunks being stored in town. My main objection to a warbag was that every thing I wanted to get out of it was always in the bottom. If I needed a clean pair of socks, I would ram my arm down in the bag, feeling around for the wiley socks, but encountering instead, such items as gloves, underwear, shirt, or perhaps a piece of mosquito netting, and after yanking up a few of the unwanted items by mistake, I would give up, emptying the whole lot out on my bed. I threatened to make another opening in the bottom of the bag to save time. As a forerunner of today's fancy toilet case, I preempted a used empty two-pound Union Leader tobacco tin, in which was kept my Arbuckle Brand razor, shaving stick (soap), shaving brush, hand mirror, needles and thread, and a teaspoon of flaxseed my thoughtful mother had given me for use in case I got a grain of sand or some chaff in my eye!

My camp bedroll, which was about standard equipment for the age, included a sogan, double wool blanket, a light cotton blanket, and a small pillow, all surrounded by a tarp as a protection from dust, rain or snow.

Mr. Samuel W. Brunt, better known as the Colonel, and his son Arthur headed up the surveying organization I had joined. The Colonel, a land surveyor of long experience, having held contracts in California before going to Wyoming, was an elderly man with gray whiskers and a twinkle in his eyes. Being blessed with a jovial disposition, he was the life of the outfit in camp or on the trail. By showing a friendly interest in each of his employees, and inquiring into their general welfare, he kept the morale of the party high.

This prospective farm land we were surveying was a level, dry, desert stretching for miles to the west and north from Garland, with not a tree, fence, or anything to break the monotony of the shimmering landscape except the ribbon like railroad track pointing straight west, only to disappear in a mirage a few miles away. There was nothing on the powdery soil but saltsage, greasewood, cactus, anthills, prairiedog towns and buffalo skulls. To break me in on the first day the Colonel assigned me to serve as cornerman on the survey crew in charge of Wilford Utterbach, a slender young man, six feet, two inches tall, from Iowa, who set a swift gait that was hard for me to maintain. Starting with breakfast at six o'clock in the morning, where each man prepared his own lunch, which he wrapped in a red handkerchief and tied to his belt, where he also carried a quart canteen filled with drinking water. Walking, I soon discovered, was an important part of a surveyor's job. After walking two or three miles to the starting corner, they continued to walk as they surveyed five or six miles of section lines, stopping to dig holes for marked corner stones every half mile, then walk back to camp. Finding suitable corner stones at each corner point, chiseling on the appropriate marks, and setting them in the ground, was my job. There were also corner accessories to build, consisting of mounds of stone or pits dug in the ground. However, other members of the party usually helped me with those chores.

Going all day long in midsummer on one quart of drinking water I found the most disagreeable feature of the work. Until a newcomer

got used to conserving his water, he usually suffered from thirst in the afternoons. Experienced hands would try to refrain from drinking until noon, thus saving a full canteen to sip on while eating lunch, and for a few swallows along in the afternoon when their mouth got dry. When extremely thirsty, I was not choosy about the kind of water I would drink. I have often greedily drunk from stagnant pools having a heavy green scum, dead bugs, and grasshoppers floating on the surface. I managed to make out pretty well by bellying down, carefully blowing back the scum, and quickly dunking my face in the murky water well below the scum and drinking my fill, straining the water through my teeth. No ill effects were suffered from drinking such water unless it had built up a heavy concentrate of alkali. Strong alkali water standing in pools having muddy banks could be identified by being crystal clear, But we found that standing murky water was usually safe to drink.

I'll never forget the time Old Denver, the big work horse jumped up into the wagon box! A couple of weeks after I had joined the survey party I took a team and wagon to the Shoshone River, a few miles away, for a load of fire wood for the cook. Upon returning I unharnessed and tied to the sides of the wagon, the two horses, both big clumsy draft animals, weighing around seventeen hundred pounds each, named Ben and Denver. Later, in the afternoon, hearing a commotion out at the wagon I rushed out of the tent and saw the two horses rearing, pulling, and jumping for all they were worth, trying to break loose. The wagon, a light 2½ inch Studebaker with bolster springs, to which the horses were tied, was parked almost under the railroad trestle.

and an engine was pushing a loaded coal car up the incline to the coal chute, puffing clouds of black smoke, ^{and} shooting spurts of hissing steam out over my horses, scaring them almost to death.

At the height of the excitement, old Denver jumped all the way up into the small wagon box with all four feet. The big ungainly animal, with his large clumsy feet, and long hair on his lower legs and fetlocks, looked odd standing up in the small wagon box, looking uneasily down from his strange perch. Being a new experience for him he paused to view his surroundings, while I shuddered, wondering what would happen next. Fearing they would hurt me in their excitement, I was afraid to rush in to untie the halter ropes. Fortunately, the poor horse managed to hop out onto the ground again without injuring himself. By this time the engineer, having spotted the car, was coasting quietly down the incline, and the show was over.

Packrats in the cook tent at night caused the cooks a lot of trouble. Rhoda, the cook, said that one morning while starting a fire in the cook stove she heard a scratching and looked up to see a big longwhiskered packrat staring her in the face, from the top of a gingersnap box in the cupboard. Frightened at first by his big ears and popeyes, she quickly regained her composure, grabbing a stick of stovewood she took after the marauding rodent, that, fortunately, or the rat, was too quick for her. She said that quite often, when reaching into the wooden dried prune box for a mess of prunes, she would find instead, a bunch of dried chips, old grass roots, or pieces of sticks the thieving rats had traded for prunes. Occasionally, the vagaries of the Wyoming breezes played havoc with our plans. One evening as the men were about half way through eating supper a wind hit us from the west, flattened tents, sent plates, pans and stove pipe flying for a hundred yards or more. Causing us to spend the remainder of the evening patching canvas, and picking up dishes.

On the first clear day I had in Garland, I was impressed, and deceived by the clarity objects could be discerned at great distances. For instance, in the clear, bright, rarefied atmosphere, without trees or buildings to obscure the view, Hart Mountain, twenty-nine miles away, to the west, seemed almost in walking distance from our camp. This land mark, standing volcanolike, high above the surrounding country, was capped by massive layers of light yellowish limestone, tilted slightly to the east, and was surrounded by perpendicular cliffs some five hundred feet in height on all but the east side. A heavy growth of pine and fir timber covered the central portion of the flat top and extended down the gradual east slope provided an easy access route to the summit, where in July 1911 I established an iron post section corner. That day is remembered as the time we saw the pack of timber wolves from the top of the peak. Seven of the surly, ill-tempered brutes on a ridge a half mile west, barked and howled defiance at us across the chasm that separated us, sending cold chills up and down our spines. Before leaving this high vantage point, a quick look was taken of the magnificent view of the surrounding country, a new experience for us plains dwellers, this being long before the days of the aeroplane.

Hart Mountain, standing apart from the main mountain range, and easily identified by its peculiar markings served as a guide post for travelers throughout the Big Horn Basin. Basin residents, returning after a long absence, again seeing the familiar land mark, regarded it as a sign of welcome, for it gave them a feeling of warmth and homecoming.

Because the desert where we were surveying was infested with rattlesnakes and stinging scorpions, we had to be very careful when picking up rocks for mounds at the corners, for those poisonous creatures lurk under overhanging rocks ever ready to strike at any intruder. For a little fun we occasionally took time out to play tricks on some of the trouble makers. One day at noontime on the prairie a scorpion about three inches long was discovered crawling along the ground with his jointed tail curved over his back, his long needle sharp stinger sticking straight up, threatening to stab anything within reach. To the great surprise of the scorpion, it was dropped into a craterlike hole scooped in the top of a nearby anthill, where the indignant little insects pounced on the shuffling monster from all sides, biting and pulling with all their might. The scorpion, with his deadly stinger and vicious pincers, massacred whole flocks of the desperate ants. But the courageous little fighters kept sending reinforcements until, by pulling a leg off here and there, they succeeded in tearing the scorpion limb from limb and threw the pieces over the side of their hill. On another occasion we got even with a big cantankerous rattler by having one of the boys, who chewed tobacco, spit tobacco juice in its mouth while I pinned its head to the ground with a forked stick. The rattler got stiff and lifeless for about a half hour, when it started to revive and we had to kill it with a rock.

The cadastral surveys around Garland, being completed on June 30th, 1905, I accompanied the Brunts to other similar work lying between Worland and Meeteetse, Wyoming, not returning to Garland Flat until June 1st, 1907. At that time I joined the engineering staff of the Bureau of Reclamation as a transitman, with headquarters at Camp Coulter, which is now Powell, Wyoming. Construction of the Garland Canal being in progress along the railroad I set stakes for the carpenters building forms for the concrete drops along that canal, and located and cross-sectioned portions of A, U, W, and other laterals during the balance of the summer.

Now, from the view point of the present we can see great changes have taken place. ~~Note~~^{ing} the thriving metropolis of Powell, Wyoming, surrounded by fertile irrigated farm land dotted with modern, well kept, farm homes surrounded by large grooves of shade trees, all of which are connected by a network of paved roads, it is difficult to realize that only a few years ago, within a man's lifetime, this whole area was a wild untamed desert. In those bygone days as I tramped wearily over this barren, uninhabited region, setting section corners, herds of wary antelope raced ahead of me, their white rumps bobbing as they kicked up the dust; circling back they would pause to gaze at me while the old bucks stomped and whistled their challenge. Occasionally I could see a slinking coyote sneaking up a draw, glancing over his shoulder, seeking the safety of a distant hill, where he would turn and let out a high-pitched wail just to let me know that he considered me an intruder. Or I might flush a black and white faced badger, who would waddle off on his short bowlegs, stopping to turn and

boldly stare me in the face, hissing his defiance before backing into a prairiedog hole to peep out at me over the edge of the mound. As I approached a prairie dog town the portly little citizens would stand up picket like on their mounds barking, their short tails bobbing with every yip, each one feeling safe, knowing that with one leap he could dive into the sanctuary of his under-ground home. Or I might spy a prairie owl, flying softly away on downy wings, to light and stare back at me gravely with his big round eyes, from a prairie dog hole, where apparently he made his home with the friendly prairie dogs. Sometimes I would encounter a treacherous rattle snake, already coiled and facing me, blocking my path. Fortunately a rattler almost always gave a warning buzz before striking, giving one time to stop and prepare for battle. Above all this could usually be seen a hungry golden eagle, circling high above the ground, leisurely scanning the prairie, ready to dive and grab some unsuspecting rabbit or other rodent he sees busily foraging its living. Lastly, I will mention the happy meadow lark, a favorite prairie bird of surveyors and homesteaders. This beautiful singer is always up to meet the sun with his pleasant warbling whistle. When I first arrived in the west I quickly detected a difference in his song, from that of the larks in our Missouri pastures. The eastern birds clear whistle ends with a gradually decreasing, melodious tone, while the western larks song starts out louder than his eastern cousin, but breaks off abruptly when it seems that he is only half way through.

Now, in retrospection of my first days as a surveyor in 1905, I remember how glad I was, and also how fortunate, to obtain my first employment on a survey party. Although it was in a minor position, the pay of \$40.00 per month and board, loomed big enough to lead me into following a profession that has proven both healthful and interesting. It is gratifying now to see an important development like the Shoshone Irrigation Project, and know that I had a small, rather insignificant part in getting it under way.

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