

-1-

May 18, 1912.

Survey commenced May 18, 1912, and executed with W. & L. R. Gurley light mountain transit #553, provided with solar attachment, the horizontal limb having two opposite double verniers reading to single minutes of arc, which is also the least count of the verniers of the latitude and declination arcs.

I examine the adjustments of the transit and find them correct.

To test the solar apparatus by comparing indications resulting from solar observations made during morning and evening hours, I proceed as follows:

At the south end of the meridian, recently established by Polaris observation at Fallon, Nevada, and reported in field notes of the survey of Section 12, T. 18 N., R. 29 E., I set off $39^{\circ}28'$ on the latitude arc, and $19^{\circ}25'$ on the Declination arc, and at 7 hours $51\frac{1}{2}$ minutes, a. m., local mean time, determine the meridian by solar and mark a point thereon on the established north monument of this meridian.

At the same place I set off $39^{\circ}28'$ on the latitude arc and $19^{\circ}40\frac{1}{2}'$ on the declination arc, and at 4 hours $51\frac{1}{2}$ minutes p. m., local mean time, I determine the meridian by solar and mark a point thereon as before.

The points determined by solar fall respectively 16" east and 48" west of the true meridian, as determined by Polaris; I therefore conclude that the solar attachment is correct.

My watch was compared with standard time by telegraphic clock on the morning of May 18th.

Upon diligent search all the necessary quarter and section corners were found in place and flags set on each.

At the east quarter corner of Section 32, which is in latitude $39^{\circ}28'$ N., longitude $118^{\circ}51'$ W., I set off $39^{\circ}28'$ on the latitude arc, and $19^{\circ}36'$ on the declination arc, and at 9 hours $51\frac{1}{2}$ minutes, local mean time, I determine the meridian by solar and mark a point thereon on a stake driven 5.00 chains north of my station. This meridian determines the courses used in this survey, and from the quarter corner occupied the N.E. corner of Section 32 on which a flag is visible, bears $N.0^{\circ}20'$ E.

I subdivide each section into quarter sections by ranging in with the transit and double centering on each straight line between opposite quarter corners, in each case the flags on the quarter corners being visible at or near the center of the section, and at the intersection of the lines so determined set a concrete post $24" \times 5" \times 5"$ marked 16/13, set 20" in the ground, excepting the center of section 29, a temporary stake marked 16/13 being set.

Dist.
Chains.

S.W. QUARTER, SECTION 29.

Beginning at the S.E. corner, Section 29, I run on a true line toward the S.W. corner Section 29, on which line a flag is visible, $S.89^{\circ}47'$ W.

6.32 Intersect N. or Left right of way line "L" canal, 1.52 chains from and parallel to center line. Set for witness meander corner a concrete post $24" \times 5" \times 5"$, marked W.M.C., 20" in the ground. U.S.R.S.

9.18 Meander corner, center line "L" canal.

12.04 Intersect right right of way line "L" canal, 1.52 chains from and parallel to center line. Set concrete post $24" \times 5" \times 5"$, marked W.M.C., 20" in the ground.

U.S.R.S.