

3452

195

"E"
4-679

BOOK 3452

AUG 1919

FIELD NOTES

OF THE SURVEY OF THE

East Boundary,

West Boundary,

and

Subdivision Lines of

Fractional Township 12 South, Range 21 West

of the Gila and Salt River Base and Meridian,

In the State of *ARIZONA*

EXECUTED BY

William H. Thorn, U.S. Cadastral Engineer

and

William D. Wilson, Temporary U.S. Transitman

In the capacity of U. S. Surveyor *5*, under Special Instructions dated *March 10*, 1919,

issued by the United States Surveyor General to govern surveys included in Group

No. *95*, which were approved by the Commissioner of the General Land

Office, *May 13*, 1919, and Assignment Instructions dated *Jan. 6*, 1920.

Survey commenced *February 26*, 1920.

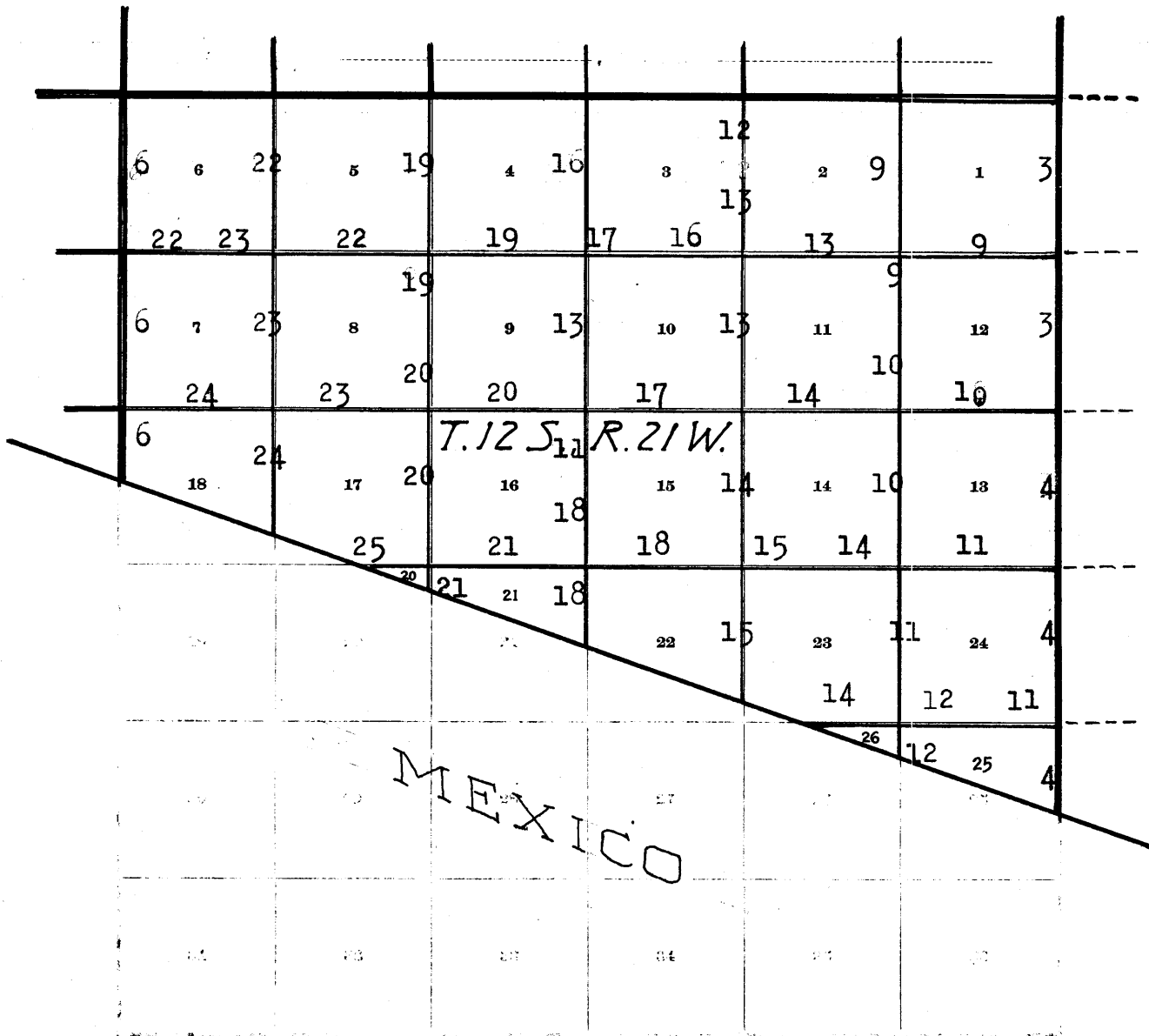
Survey completed *March 7*, 1920.

1A

BOOK 3452

Book "E"
Group 95 - - - Arizona.

INDEX DIAGRAM.



- Lines surveyed under this group.
- Lines resurveyed under this group.
- - - - - Unsurveyed.

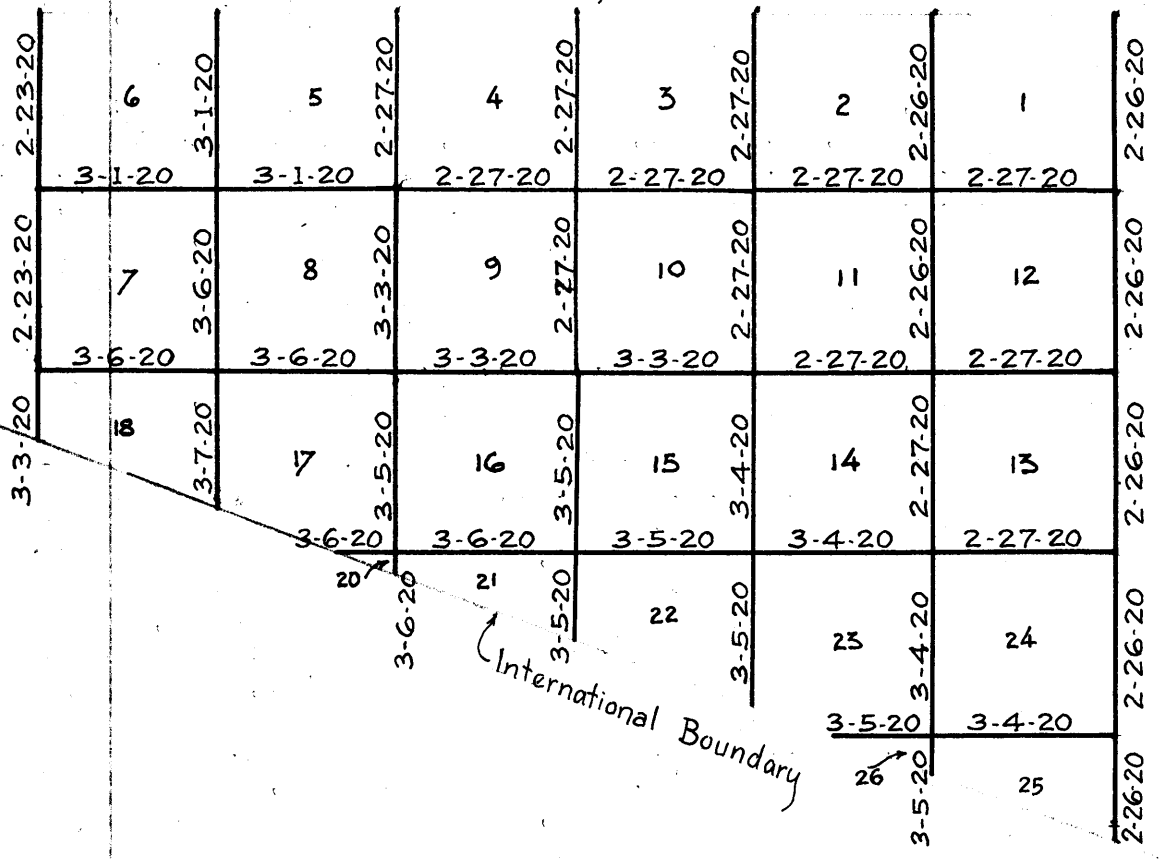
Book "E"

Group 95----- Arizona.

Fracl. Township 12 South, Range 21 West.

>DATE< DIAGRAM<

For dates of execution of survey of this line see Book "D"



Black lines indicate surveys by William H. Thorn, U.S. Cadastral Engineer, on dates shown thereon.

Red lines indicate surveys by William D. Wilson, Temporary U.S. Transitman, on dates shown thereon.

Surveys hereinafter described executed by William H. Thorn, U. S. Cadastral Engineer, and William D. Wilson, Temporary U. S. Transitman, on dates shown on diagram on page 1 hereof, using respectively Young and Sons' light mountain transits Nos. 8592 and 8148. For description of instruments and certificate of approval, see Book "A".

Unless otherwise specified, all measurements are made with a Lufkin steel tape, 5 chs. in length, compared with a Chesterman standard steel tape and found correct. The measurements are made on the slope, the vertical angles determined, and the slope measurements properly reduced to true horizontal distances.

We examine the adjustments of the transits and correct all errors; then, to test the solar apparatus, by comparing their indications, resulting from solar observations made during a.m. and p.m. hours, with a meridian determined by observations on Polaris at elongation, we proceed as follows:

Feb. 21, 1920: At our camp near the cor. of secs. 15, 16, 21 and 22, T. 11 S., R. 21 W., G. and S. R. B. and M., lat. $32^{\circ}27\frac{1}{2}'$ N., long. $114^{\circ}24\frac{1}{2}'$ W., at 9 hrs. 25.3 m. p.m., l.m.t., we observe Polaris at western elongation, in accordance with the Manual of Instructions, and mark a point in the line thus determined by a tack in a stake, firmly set in the ground, 5 chs. N. of our station.

Feb. 22, 1920. At 8 hrs. 0 m., a.m., l.m.t., we lay off the azimuth of Polaris, $1^{\circ}19\frac{1}{2}'$ to the east, and mark the true meridian thus determined by a tack in a stake, firmly set in the ground, 5 chs. N. of our station.

At 9 hrs. 0 m., a.m., l.m.t., we set off $32^{\circ}27\frac{1}{2}'$ N. on the lat. arcs; $10^{\circ}28'$ S. on the decl. arcs; and determine a meridian with each solar, which in each case agrees with the true meridian.

At apparent noon, with the lat. arcs unchanged, we observe the sun on the meridian with each solar; the resulting decl. with each instrument is $10^{\circ}25\frac{1}{2}'$ S., which is the computed decl. of the sun.

At 3 hrs. 0 m., p.m., l.m.t., with the lat. arcs unchanged, we set off $10^{\circ}22\frac{1}{2}'$ S. on the decl. arcs, and determine a meridian with each solar, which in each case agrees with the true meridian.

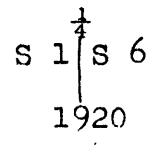
As all of the solar observations during the usual hours of solar work come within $1'30''$ of the true meridian, we conclude that the adjustments of the solars are satisfactory.

Fractional
Survey of the East Boundary of T. 12 S., R. 21 W.

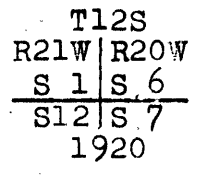
Chains.

That part of the International Boundary between United States and Mexico, forming the South Boundary of Fractional T. 12 S., R. 21 W., was surveyed in 1854-1856 by William H. Emory, Major First Cavalry and U. S. Commissioner, and was resurveyed between existing monuments in 1891-1896 under the direction of the International Boundary Commission, headed by J. W. Barlow, Lieutenant Colonel, Corps of Engineers, U. S. A., No further retracement or resurvey is of record in this office.

40.00 From the cor. of Ts. 11 and 12 S., Rs. 20 and 21 W., described in Book "D", South bet. secs. 1 and 6. Over gently rolling land, through scattering undergrowth. Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap

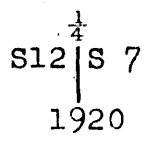


80.00 Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist. Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 1, 6, 7 and 12, marked on brass cap

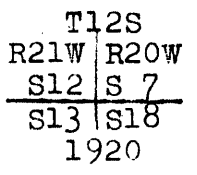


Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist. Land, gently rolling; drains NW. Soil, sandy, 3rd rate. No timber Undergrowth, greasewood. Fair growth of galletta grass.

7.00 South bet. secs. 7 and 12. Over gently rolling land, through scattering undergrowth. Asc. gradually Low raise, slopes W. Desc. very gradually. 40.00 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap



80.00 Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist. Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 7, 12, 13 and 18, marked on brass cap

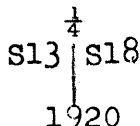


Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist. Land, gently rolling; drains W. Soil, sandy, 2nd rate. No timber. Undergrowth, greasewood and sagebrush. Fair growth of galletta grass and Indian wheat.

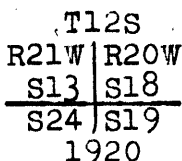
Survey of the East Boundary of Fractional T. 12 S., R. 21 W.

Chains

40.00 South bet. secs. 13 and 18.
Over nearly level land, through scattering undergrowth.
Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap

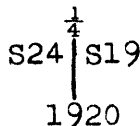


80.00 Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.
Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 13, 18, 19 and 24, marked on brass cap

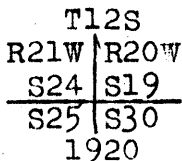


Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist.
Land, nearly level; slopes W.
Soil, sandy, 2nd rate.
No timber.
Undergrowth, greasewood and sagebrush.
Fair growth of Indian wheat.

25.00 South bet. secs. 19 and 24.
Over nearly level land, through scattering undergrowth.
Leave scattering undergrowth, enter W. end of cleared land, extending about 1/2 mile E.
37.60 Dim road, brs. NW. and SE.
40.00 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap



45.00 Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.
Leave clearing, brs. E. and W. Thence through scattering undergrowth.
80.00 Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 19, 24, 25 and 30, marked on brass cap



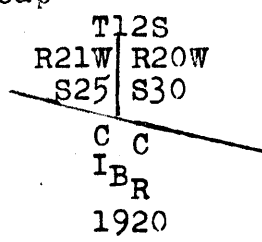
Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist.
Land, nearly level; drains W.
Soil, sandy loam, 2nd rate.
No timber.
Undergrowth, greasewood.
Fair growth of galletta grass and Indian wheat.

39.44 South bet. secs. 25 and 30.
Over nearly level land, through scattering undergrowth.
Intersect 60 ft. International Boundary Reserve, which brs. N.70°20'W. and S.70°20'E.

Survey of the East Boundary of Fractional T. 12 S., R. 21 W.

Chains.

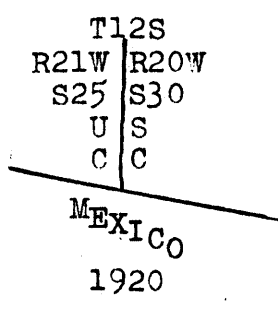
At the point of intersection, set an iron post, 3 ft. long, 3 ins. diam., 24 ins. in the ground, for Boundary Reserve closing cor. of fractional Ts. 12 S., Rs. 20 and 21 W., marked on brass cap



40.41

Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist. Intersect International Boundary between United States and Mexico, 42.82 chs. N.70°20'W. of Boundary Monument No. 197, which is of sectional iron, 8 ft. high, with concrete base, 3 ft. square. The monument faces N.19°40'E., and is marked on the United States side, "Boundary of the United States Treaty of 1853 Reestablished by Treaties 1882-1889." On the Mexican side is the inscription "Limite de la Republica Mexicana Tretado de 1853 Restablicido por Tretados de 1882-1889." The monument number, 197, is on the E. face, near the top.

At the point of intersection, set an iron post, 3 ft. long, 3 ins. diam., 24 ins. in the ground, for closing cor. of fractional Ts. 12 S., Rs. 20 and 21 W., marked on brass cap



Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist. Land, nearly level; drains W. Soil, sandy loam, 2nd rate. No timber. Undergrowth, greasewood and sagebrush. Fair growth of galletta grass and Indian wheat.

Survey of the West Boundary of Fractional T. 12 S., R. 21 W.

Chains.

From the cor. of Ts. 11 and 12 S., Rs. 21 and 22 W., described in Book "D",
South bet. secs. 1 and 6.
Over gently rolling land, through scattering undergrowth.
40.00 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the
ground, for $\frac{1}{4}$ sec. cor., marked on brass cap

$$\begin{array}{c} \frac{1}{4} \\ \text{S } 1 \mid \text{S } 6 \\ \hline 1920 \end{array}$$

Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.
80.00 Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the
ground, for cor. of secs. 1, 6, 7 and 12, marked on
brass cap

$$\begin{array}{c} \text{T12S} \\ \text{R22W} \mid \text{R21W} \\ \text{S } 1 \mid \text{S } 6 \\ \hline \text{S12} \mid \text{S } 7 \\ \hline 1920 \end{array}$$

Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW.,
and NW. of post, 3 ft. dist.
Land, gently rolling.
Soil, sandy loam, 2nd rate.
No timber.
Undergrowth, greasewood and sagebrush.
Fair growth of galletta grass and Indian wheat.

South bet. secs. 7 and 12.
Over gently rolling land, through scattering undergrowth.
40.00 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the
ground, for $\frac{1}{4}$ sec. cor., marked on brass cap

$$\begin{array}{c} \frac{1}{4} \\ \text{S12} \mid \text{S } 7 \\ \hline 1920 \end{array}$$

Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.
80.00 Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the
ground, for cor. of secs. 7, 12, 13 and 18, marked on
brass cap

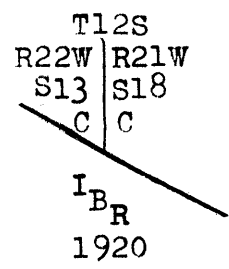
$$\begin{array}{c} \text{T12S} \\ \text{R22W} \mid \text{R21W} \\ \text{S12} \mid \text{S } 7 \\ \hline \text{S13} \mid \text{S18} \\ \hline 1920 \end{array}$$

Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW.
and NW. of post, 3 ft. dist.
Land, gently rolling.
Soil, sandy loam, 2nd rate.
No timber.
Undergrowth, greasewood and sagebrush.
Fair growth of galletta grass and Indian wheat.

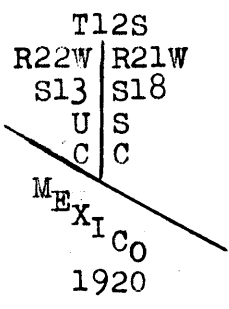
South bet. secs. 13 and 18.
Over nearly level land, through scattering undergrowth.
Intersect 60 ft. International Boundary Reserve, which
brs. N.70°20'W. and S.70°20'E.
28.78 At the point of intersection, set an iron post, 3 ft. long,
3 ins. diam., 24 ins. in the ground, for Boundary Reserve
closing cor. of fractional Ts. 12 S., Rs. 21 and 22 W.,
marked on brass cap

Survey of the West Boundafy of Fractional T. 12 S., R. 21 W.

Chains



29.75 Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist.
Intersect International Boundary between United States
and Mexico, 161.74 chs. N.70°20'W. of Boundary Monument
No. 198. The description of this monument is identical
with the exception of the number, to monument No. 197,
hereinbefore described.
At the point of intersection, set an iron post, 3 ft. long,
3 ins. diam., 24 ins. in the ground, for closing cor. of
fractional Ts. 12 S., Rs. 21 and 22 W., marked on brass
cap



Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist.
Land, nearly level; drains W.
Soil, sandy loam, 2nd rate.
No timber.
Undergrowth, greasewood and sagebrush.
Fair growth of galletta grass and Indian wheat.

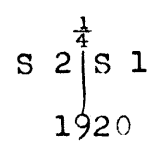
Boundaries of Fractional T. 12 S., R. 21 W.
 Latitudes, departures and closing errors.

Line designated.	True bearing.	Dist. chs.	Latitudes.		Departures.	
			N. chs.	S. chs.	E. chs.	W. chs.
Int. Bdy.	N.70°20'W.	505.77	170.22			476.27
W. Bdy.	North	189.75	189.75			
N. Bdy.	N.89°58'E.	475.68	.28		475.68	
E. Bdy.	South	360.41		360.41		
Convergency.					.26	
<u>Totals</u>			360.25	360.41	475.94	476.27
				360.25		475.94
Error in lat.				.16		
Error in dep.						.33

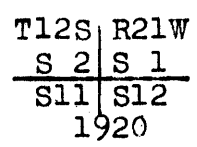
Survey of Subdivision of Fractional T. 12 S., R. 21 W.

Chains.

From the cor. of secs. 1, 2, 35 and 36, on the N. bdy. of Tp., described in Book "D", S.0°1'E., bet. secs. 1 and 2.
 Over gently rolling land, through scattering undergrowth.
 Asc. 50 ft.
 40.00 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap



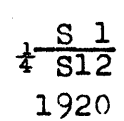
Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.
 Asc. 50 ft.
 80.00 Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 1, 2, 11 and 12, marked on brass cap



Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist.
 Land, gently rolling; drains NW.
 Soil, sandy loam, 2nd rate.
 No timber.
 Undergrowth, greasewood and sagebrush.
 Fair growth of galletta grass and Indian wheat.

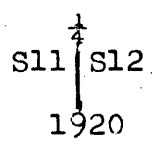
N.89°58'E., on a random line, bet. secs. 1 and 12.
 40.00 Set temp. 1/4 sec. cor.
 80.02 Fall 9 lks. N. of the cor. of secs. 1, 6, 7 and 12, on the E. bdy. of To., hereinbefore described.

Thence N.89°58'W., on a true line, bet. secs. 1 and 12.
 Over nearly level land, through scattering undergrowth.
 40.01 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap



Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.
 80.02 The cor. of secs. 1, 2, 11 and 12.
 Land, nearly level; drains N.
 Soil, sandy loam, 2nd rate.
 No timber.
 Undergrowth, greasewood and sagebrush.
 Fair growth of galletta grass and Indian wheat.

S.0°1'E., bet. secs. 11 and 12.
 Over gently rolling land, through scattering undergrowth.
 Asc. slightly.
 5.00 Low raise, brs. E. and W. Thence over level land.
 40.00 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap



Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains.	<p>Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.</p> <p>80.00 Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 11, 12, 13 and 14, marked on brass cap</p> <p style="text-align: center;">T12S R21W S11 S12 ----- S14 S13 1920</p> <p>Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist. Land, gently rolling and level. Soil, sandy loam, 2nd rate. No timber. Undergrowth, greasewood and sagebrush. Fair growth of galletta grass and Indian wheat.</p>
	<p>S.89°58'E., on a random line, bet. secs. 12 and 13.</p> <p>40.00 Set temp. $\frac{1}{4}$ sec. cor.</p> <p>80.00 Fall 5 lks. S. of the cor. of secs. 7, 12, 13 and 18, on E. bdy. of Tp., hereinbefore described.</p> <p>Thence West on a true line, bet. secs. 12 and 13.</p> <p>Over gently rolling land, through scattering undergrowth.</p> <p>40.00 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap</p> <p style="text-align: center;">$\frac{1}{4}$ S12 ----- S13 1920</p> <p>Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.</p> <p>80.00 The cor. of secs. 11, 12, 13 and 14. Land, gently rolling; drains W. Soil, sandy loam, 2nd rate. No timber. Undergrowth, greasewood and sagebrush. Fair growth of galletta grass and Indian wheat.</p>
	<p>S.0°1'E., bet. secs. 13 and 14.</p> <p>Over level land, through medium undergrowth.</p> <p>40.00 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap</p> <p style="text-align: center;">$\frac{1}{4}$ S14 S13 ----- 1920</p> <p>Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.</p> <p>70.00 Enter clearing, brs. E. and W.</p> <p>80.00 Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 13, 14, 23 and 24, marked on brass cap</p> <p style="text-align: center;">T12S R21W S14 S13 ----- S23 S24 1920</p> <p>Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist. Land, level; drains W. Soil, sandy loam, 2nd rate. No timber. Undergrowth, greasewood and sagebrush.</p>

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains.	Fair growth of Indian wheat.
40.00 79.96 16.75 39.98	<p>East on a random line, bet. secs. 13 and 24. Set temp. $\frac{1}{4}$ sec. cor. Intersect the cor. of secs. 13, 18, 19 and 24, on the E. bdy. of Tp., hereinbefore described. Thence West on a true line, bet. secs. 13 and 24. Over gently rolling land, through medium undergrowth. Dim road, brs. NE. and SW. Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap</p> $\begin{array}{c} \frac{1}{4} S13 \\ \hline \frac{1}{4} S24 \\ 1920 \end{array}$
72.95 79.96	<p>Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist. Enter clearing, brs. N. and S. The cor. of secs. 13, 14, 23 and 24. Land, gently rolling; drains W. Soil, sandy, 2nd rate. No timber. Undergrowth, greasewood and sagebrush. Fair growth of galletta grass and Indian wheat.</p>
5.00 20.00 40.00	<p>S.0°1'E., bet. secs. 23 and 24. Over level land. Leave clearing, brs. E. and W. Thence through scattering undergrowth. Enter heavy sand, brs. W. and SE. Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap</p> $\begin{array}{c} \frac{1}{4} \\ S23 \mid S24 \\ \hline 1920 \end{array}$
80.00	<p>Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist. Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 23, 24, 25 and 26, marked on brass cap</p> $\begin{array}{c} T12S R21W \\ S23 \mid S24 \\ \hline S26 \mid S25 \\ 1920 \end{array}$ <p>Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist. Land, level. Soil, sandy, 2nd and 4th rates. No timber. Undergrowth, greasewood and sagebrush.</p>
40.00 79.96	<p>East on a random line, bet. secs. 24 and 25. Set temp. $\frac{1}{4}$ sec. cor. Fall 5 lks. N. of the cor. of secs. 19, 24, 25 and 30, on the E. bdy. of Tp., hereinbefore described. Thence N.89°58'W., on a true line, bet. secs. 24 and 25. Over level land, through scattering undergrowth.</p>

12

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains.

39.98 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap

S24
—
S25
1920

Dig pits, 18 X 8 X 12 ins., E. and W. of post, 3 ft. dist.

79.96 The cor. of secs. 23, 24, 25 and 26.

Land, level; drains NW.

Soil, sandy, 2nd rate.

No timber.

Undergrowth, greasewood and sagebrush.

10.88

S.0°1'E., bet. secs. 25 and 26.

Over level land, through scattering undergrowth.

Intersect 60 ft. International Boundary Reserve, which brs. N.70°20'W. and S.70°20'E.

At the point of intersection, set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for Boundary Reserve closing cor. of fractional secs. 25 and 26, marked on brass cap

T12S R21W
S26 | S25
— C C
IBR
1920

11.85

Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist.

Intersect International Boundary between United States and Mexico, 127.75 chs. N.70°20'W. of International Boundary Monument No. 197, hereinbefore described.

At the point of intersection, set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for closing cor. of fractional secs. 25 and 26, marked on brass cap

T12S R21W
S26 | S25
— U S
C C
MEXICO
1920

Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist.
Land, level.

Soil, sandy, 4th rate.

No timber.

Undergrowth, greasewood and sagebrush.

40.00

From the cor. of secs. 2, 3, 34 and 35, on the N. bdy. of Tp., hdescribed in Book "D",

S.0°1'E., bet. secs. 2 and 3.

Over nearly level land, through scattering undergrowth.

Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap

S23 | S 2
—
1920

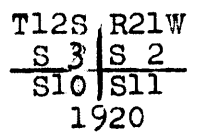
Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains.

80.00

Set an iron post, 3 ft. long, 2 ins diam., 24 ins. in the ground, for cor. of secs. 2, 3, 10 and 11, marked on brass cap



Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist.
Land, nearly level.
Soil, shifting sand; 4th rate.
No timber.
Undergrowth, greasewood and sagebrush.

40.00

N.89°58'E., on a random line, bet. secs. 2 and 11.
Set temp. 1/4 sec. cor.

80.08

Intersect N. and S. line, 2 lks. N. of the cor. of secs. 1, 2, 11 and 12.

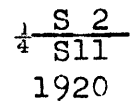
Thence

S.89°59'W., on a true line, bet. secs. 2 and 11.

Over gently rolling land, through medium undergrowth.

40.04

Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap



Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.

80.08

The cor. of secs. 2, 3, 10 and 11.

Land, gently rolling.

Soil, sandy, 3rd and 4th rates.

No timber.

Undergrowth, greasewood and sagebrush.

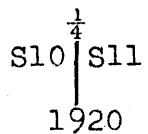
Fair growth of Indian wheat.

40.00

S.0°1'E., bet. secs. 10 and 11.

Over nearly level land, through scattering undergrowth.

Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap

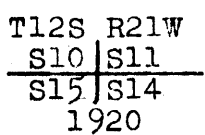


Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.

80.00

Thence over sand dunes, br. WNW. and SW.

Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 10, 11, 14 and 15, marked on brass cap



Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist.

Land, nearly level.

Soil, drifting sand; 4th rate.

No timber.

Undergrowth, sagebrush.

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains.	N.89°59'E., on a random line, bet. secs. 11 and 14.
40.00	Set temp. $\frac{1}{4}$ sec. cor.
80.08	Intersect N. and S. line, 5 lks. N. of the cor. of secs. 11, 12, 13 and 14.
	Thence
	N.89°59'W., on a true line, bet. secs. 11 and 14.
	Over level land, through scattering undergrowth.
30.10	Leave level land; thence over gently rolling sand dunes, through thick sand.
40.04	Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap
	$\begin{array}{c} \frac{1}{4} S11 \\ \frac{1}{4} S14 \\ 1920 \end{array}$
	Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.
80.08	The cor. of secs. 10, 11, 14 and 15. Land, level and gently rolling. Soil, sandy, 3rd and 4th rates. No timber. Undergrowth, greasewood and sagebrush. Fair growth of galletta grass.
	S.0°1'E., bet. secs. 14 and 15. Over gently rolling land, over sand dunes, through scattering undergrowth.
20.00	Leave sand dunes, br. W. and NE. Thence over nearly level land.
40.00	Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap
	$\begin{array}{c} \frac{1}{4} \\ S15 S14 \\ 1920 \end{array}$
	Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.
80.00	Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 14, 15, 22 and 23, marked on brass cap
	$\begin{array}{c} T12S, R21W \\ \frac{1}{4} S15 S14 \\ \frac{1}{4} S22 S23 \\ 1920 \end{array}$
	Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist. Land, gently rolling and nearly level. Soil, sand, 4th rate. No timber. Undergrowth, sagebrush and greasewood.
	S.89°59'E., on a random line, bet. secs. 14 and 23.
40.00	Set temp. $\frac{1}{4}$ sec. cor.
80.10	Intersect N. and S. line, 2 lks. N. of the cor. of secs. 13, 14, 23 and 24.
	Thence
	N.89°58'W., on a true line, bet. secs. 14 and 23.
	Over level land, devoid of timber or undergrowth.
20.30	Dim road, brs. NW. and SE.
40.05	Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap
	$\begin{array}{c} \frac{1}{4} S14 \\ \frac{1}{4} S23 \\ 1920 \end{array}$

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains.

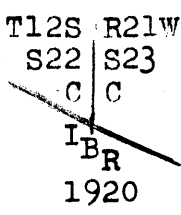
55.10 Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.
 Leave clearing, enter undergrowth and deep sand, brs. N. and S.

80.10 The cor. of secs. 14, 15, 22 and 23.
 Land, level.
 Soil, sandy loam, 2nd rate; remainder, sandy, 4th rate.
 No timber.
 Undergrowth, greasewood and sagebrush.

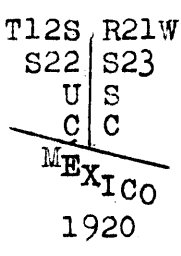
40.00 S.0°1'E., bet. secs. 22 and 23.
 Over level land, through scattering undergrowth.
 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap



62.22 Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.
 Intersect 60 ft. International Boundary Reserve, which brs. N.70°20'W. and S.70°20'E.
 At the point of intersection, set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for Boundary Reserve closing cor. of fractional secs. 22 and 23, marked on brass cap



63.19 Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist.
 Intersect International Boundary between United States and Mexico, 212.89 chs. N.70°20'W. of Boundary Monument No. 197, hereinbefore described.
 At the point of intersection, set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for closing cor. of fractional secs. 22 and 23, marked on brass cap



Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist.
 Land, level.
 Soil, 4th rate.
 No timber.
 Undergrowth, greasewood and sagebrush.

30.58 From the cor. of secs. 23, 24, 25 and 26, N.89°58'W. on a true line, bet. secs. 23 and 26.
 Over gently rolling land, through scattering undergrowth.
 Intersect 60 ft. International Boundary Reserve, which brs. N.70°20'W. and S.70°20'E.
 At the point of intersection, set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for Boundary Reserve closing cor. of fractional secs. 23 and 26, marked on brass cap

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains.

$$\begin{array}{r} \text{T12S R21W} \\ \text{I} \quad \text{C} \quad \text{S23} \\ \text{BR} \quad \text{C} \quad \text{S26} \end{array}$$

1920

33.28 Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist.
Intersect International Boundary between United States and Mexico, 163.11 chs. N.70°20'W. of Boundary Monument No. 197, hereinbefore described.
At the point of intersection, set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for closing cor. of fractional secs. 23 and 26, marked on brass cap

$$\begin{array}{r} \text{T12S R21W} \\ \text{ME} \quad \text{C} \quad \text{S23} \\ \text{CO} \quad \text{C} \quad \text{S26} \end{array}$$

1920

Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist.
Land, gently rolling.
Soil, 4th rate; sand dunes.
No timber.
Undergrowth, greasewood and sagebrush.

40.00 From the cor. of secs. 3, 4, 33 and 34, on the N. bdy. of Tp., described in Book "D", S.0°2'E., bet. secs. 3 and 4.
Over rolling sand dunes, through scattering undergrowth.
Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap

$$\begin{array}{c} \dagger \\ \text{S } 4 \mid \text{S } 3 \\ \text{1920} \end{array}$$

80.00 Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.
Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 3, 4, 9 and 10, marked on brass cap

$$\begin{array}{r} \text{T12S R21W} \\ \text{S } 4 \mid \text{S } 3 \\ \text{S } 9 \mid \text{S } 10 \\ \text{1920} \end{array}$$

Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist.
Land, rolling sand dunes.
Soil, sandy, 3rd rate.
No timber.
Undergrowth, sagebrush and greasewood.

40.00 N.89°58'E., on a random line, bet. secs. 3 and 10.
Set temp. $\frac{1}{4}$ sec. cor.
80.04 Intersect N. and S. line, 9 lks. N. of the cor. of secs. 2, 3, 10 and 11.

Thence

N.89°58'W., on a true line, bet. secs. 3 and 10.
Over level land, through scattering undergrowth.

10.00 Thence over rolling land, across sand dunes.
40.02 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap

$$\begin{array}{c} \dagger \text{S } 3 \\ \dagger \text{S } 10 \\ \text{1920} \end{array}$$

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

<p>Chains.</p> <p>80.04</p>	<p>Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.</p> <p>The cor. of secs. 3, 4, 9 and 10. Land, level and rolling. Soil, sandy, 3rd rate. No timber. Undergrowth, greasewood and sagebrush.</p>
<p>40.00</p> <p>80.00</p>	<p>S.0°2'E., bet. secs. 9 and 10. Over rolling sand dunes, through scattering undergrowth. Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for ¼ sec. cor., marked on brass cap</p> $\begin{array}{c} \frac{1}{4} \\ S\ 9 \mid S10 \\ 1920 \end{array}$ <p>Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.</p> <p>Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 9, 10, 15 and 16, marked on brass cap</p> $\begin{array}{c} T12S\ R21W \\ S\ 9 \mid S10 \\ \hline S16 \mid S15 \\ 1920 \end{array}$ <p>Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist. Land, rolling sand dunes. Soil, sandy, 3rd rate. No timber. Undergrowth, greasewood and sagebrush.</p>
<p>40.00</p> <p>79.98</p> <p>39.99</p> <p>79.98</p>	<p>S.89°58'E., on a random line, bet. secs. 10 and 15. Set temp. ¼ sec. cor.</p> <p>Intersect the cor. of secs. 10, 11, 14 and 15, Thence N.89°58'W., on a true line, bet. secs. 10 and 15. Over rolling sand dunes, through scattering undergrowth.</p> <p>Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for ¼ sec. cor., marked on brass cap</p> $\begin{array}{c} \frac{1}{4} \ S10 \\ \hline S15 \\ 1920 \end{array}$ <p>Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.</p> <p>The cor. of secs. 9, 10, 15 and 16. Land, rolling sand dunes. Soil, sand, 4th rate. No timber. Undergrowth, sagebrush and greasewood.</p>
<p>40.00</p>	<p>S.0°2'E., bet. secs. 15 and 16. Over rolling sand dunes, through scattering undergrowth. Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for ¼ sec. cor., marked on brass cap</p> $\begin{array}{c} \frac{1}{4} \\ S16 \mid S15 \\ 1920 \end{array}$

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

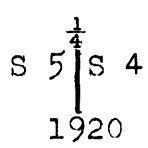
Chains.	<p>Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.</p> <p>Thence across deep sand.</p> <p>80.00 Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 15, 16, 21 and 22, marked on brass cap</p> $\begin{array}{r l} T12S & R21W \\ S16 & S15 \\ \hline S21 & S22 \\ 1920 \end{array}$ <p>Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist.</p> <p>Land, rolling.</p> <p>Soil, 4th rate; sand dunes and shifting sand.</p> <p>No timber.</p> <p>Undergrowth, greasewood and sagebrush.</p>
40.00	<p>S.89°58'E., on a random line, bet. secs. 15 and 22.</p> <p>Set temp. $\frac{1}{4}$ sec. cor.</p>
80.08	<p>Intersect the cor. of secs. 14, 15, 22 and 23.</p> <p>Thence</p> <p>N.89°58'W., on a true line, bet. secs. 15 and 22.</p>
40.04	<p>Over rolling land, through scattering undergrowth.</p> <p>Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap</p> $\begin{array}{r} S15 \\ \frac{1}{4} S22 \\ 1920 \end{array}$
80.08	<p>Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.</p> <p>The cor. of secs. 15, 16, 21 and 22.</p> <p>Land, rolling.</p> <p>Soil, drifting sand, 4th rate.</p> <p>No timber.</p> <p>Undergrowth, greasewood and sagebrush.</p>
33.52	<p>S.0°2'E., bet. secs. 21 and 22.</p> <p>Over rolling land, through scattering undergrowth.</p> <p>Intersect 60 ft. International Boundary Reserve, which brs. N.70°20'W. and S.70°20'E.</p> <p>At the point of intersection, set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for Boundary Reserve closing cor. of fractional secs. 21 and 22, marked on brass cap</p> $\begin{array}{r l} T12S & R21W \\ S21 & S22 \\ \hline C & C \\ \hline I & B \\ \hline 1920 \end{array}$
34.49	<p>Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist.</p> <p>Intersect International Boundary between United States and Mexico, 298.00 chs. N.70°20'W. of Boundary Monument No. 197, hereinbefore described.</p> <p>At the point of intersection, set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for closing cor. of fractional secs. 21 and 22, marked on brass cap</p> $\begin{array}{r l} T12S & R21W \\ S21 & S22 \\ \hline U & S \\ \hline C & C \\ \hline MEXICO \\ 1920 \end{array}$

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

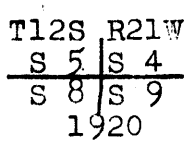
chains.

Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist.
Land, rolling.
Soil, drifting sand, 4th rate.
No timber.
Undergrowth, greasewood and sagebrush.

40.00 From the cor. of secs. 4, 5, 32 and 33, on the N. bdy. of Tp., described in Book "D", S.0°2'E., bet. secs. 4 and 5.
Over rolling sand dunes, through scattering undergrowth.
Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap



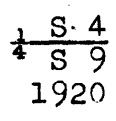
80.00 Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.
Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 4, 5, 8 and 9, marked on brass cap



Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist.
Land, rolling sand dunes.
Soil, sand, 3rd rate.
No timber.
Undergrowth, greasewood and sagebrush.

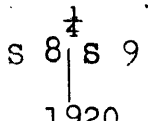
40.00 N.89°58'E., on a random line, bet. secs. 4 and 9.
Set temp. 1/4 sec. cor.
80.04 Intersect N. and S. line, 9 lks. N. of the cor. of secs. 3, 4, 9 and 10.

40.02 Thence N.89°58'W., on a true line, bet. secs. 4 and 9.
Over rolling sand dunes, through scattering undergrowth.
Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap



80.04 Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.
The cor. of secs. 4, 5, 8 and 9.
Land, rolling sand dunes.
Soil, sand, 3rd rate.
No timber.
Undergrowth, greasewood and sagebrush.

40.00 S.0°2'E. bet. secs. 8 and 9.
Over rolling land, through scattering undergrowth.
Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for 1/4 sec. cor., marked on brass cap



Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains.	<p>Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.</p> <p>80.00 Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 8, 9, 16 and 17, marked on brass cap</p> $\begin{array}{r} T12S R21W \\ \hline S 8 S 9 \\ \hline S17 S16 \\ 1920 \end{array}$ <p>Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist.</p> <p>land, rolling. Soil, shifting sand, 4th rate. No timber. Undergrowth, greasewood and sagebrush.</p>
40.00	S.89°58'E., on a random line, bet. secs. 9 and 16.
80.04	Set temp. $\frac{1}{4}$ sec. cor. Intersect N. and S. line, 9 lks. S. of the cor. of secs. 9, 10, 15 and 16.
20.00	Thence S.89°58'W., on a true line, bet. secs. 9 and 16. Over rolling sand dunes, through scattering undergrowth. Leave sand dunes, br. NE. and SW. Thence over deep drifting sands.
40.02	Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap
	$\begin{array}{r} \frac{1}{4} S 9 \\ \hline \frac{1}{4} S16 \\ 1920 \end{array}$
80.04	<p>Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.</p> <p>The cor. of secs. 8, 9, 16 and 17. Land, rolling. Soil, sand, 4th rate; sand dunes and drifting sand. No timber. Undergrowth, greasewood and sagebrush.</p>
40.00	<p>S.0°2'E., bet. secs. 16 and 17. Over rolling land, through scattering undergrowth. Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap</p> $\begin{array}{r} \frac{1}{4} \\ S17 S16 \\ \hline 1920 \end{array}$
75.00	Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist. Leave rolling, enter mountainous land. Asc. 80 ft., over N. slope.
78.50	Spur, slopes ENE. Desc. 45 ft.
80.00	Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 16, 17, 20 and 21, marked on brass cap
	$\begin{array}{r} T12S R21W \\ \hline S17 S16 \\ \hline S20 S21 \\ 1920 \end{array}$
	<p>And raise a mound of stone, 3 ft. base, 2 ft. high, W. of cor. Land, rolling and mountainous.</p>

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains. Soil, sand, 4th rate; S. 5 chs., rocky, 4th rate.
 No timber.
 Undergrowth, greasewood and sagebrush.

40.00 N.89°58'E., on a random line, bet. secs. 16 and 21.
 Set temp. ¼ sec. cor.
 80.04 Intersect the cor. of secs. 15, 16, 21 and 22.
 Thence
 S.89°58'W., on a true line, bet. secs. 16 and 21.
 40.02 Over rolling sand dunes, through scattering undergrowth.
 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the
 ground, for ¼ sec. cor., marked on brass cap

$$\frac{1}{4} \frac{S16}{S21}$$
 1920

Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft.
 dist.
 Leave sand dunes; thence over deep sand.
 75.00 Leave sand; asc. E. slope of hill.
 80.04 The cor. of secs. 16, 17, 20 and 21.
 Land, rolling; W. 5 chs., mountainous.
 Soil, sand dunes and drifting sand; 4th rate; W. 5 chs.,
 rocky, 4th rate.
 No timber.
 Undergrowth, greasewood and sagebrush.

S.0°2'E., bet. secs. 20 and 21.
 Over mountainous land, through scattering undergrowth.
 Asc. 50 ft., over NE. slope.
 2.30 Spur, slopes E. Desc. 75 ft.
 4.80 Intersect 60 ft. International Boundary Reserve, which
 brs. N.70°20'W. and S.70°20'E.
 At the point of intersection, set an iron post, 3 ft. long,
 2 ins. diam., on bed rock, with marked stone, for
 Boundary Reserve closing cor. of fractional secs. 20 and
 21; and raise a mound of stone, 3 ft. base, 1½ ft. high,
 around post, with brass cap marked

$$\begin{array}{c} T12S R21W \\ S20 | S21 \\ C | C \\ \hline I \\ BR \\ 1920 \end{array}$$

And raise a mound of stone, 3 ft. base, 1½ ft. high, N.
 of cor.
 5.77 Intersect International Boundary between United States and
 Mexico, 383.05 chs. N.70°20'W. of Boundary Monument No.
 197, hereinbefore described, and 3.80 chs. S.70°20'E.
 of Boundary Monument No. 198, hereinbefore described.
 At the point of intersection, set an iron post, 3 ft. long,
 2 ins. diam., 24 ins. in the ground, with marked stone,
 for closing cor. of fractional secs. 20 and 21; and raise
 a mound of stone, around post, with brass cap marked

$$\begin{array}{c} T12S R21W \\ S20 | S21 \\ U | S \\ C | C \\ \hline MEXICO \\ 1920 \end{array}$$

And raise a mound of stone, 3 ft. base, 1½ ft. high, N.
 of cor.

22

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains.

Land, mountainous.
Soil, rocky, 4th rate.
No timber.
Undergrowth, greasewood.

40.00 From the cor. of secs. 5, 6, 31 and 32, on the N. bdy. of Tp., described in Book "D", S.0°3'E., bet. secs. 5 and 6.
Over gently rolling land, through scattering undergrowth.
Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap

$$\begin{array}{c} \frac{1}{4} \\ \text{S } 6 \text{ | S } 5 \\ \hline 1920 \end{array}$$

80.00 Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.
Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 5, 6, 7 and 8, marked on brass cap

$$\begin{array}{c} \text{T12S R21W} \\ \text{S } 6 \text{ | S } 5 \\ \hline \text{S } 7 \text{ | S } 8 \\ \hline 1920 \end{array}$$

Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist.
Land, gently rolling; drains NE.
Soil, sandy, 4th rate.
No timber.
Undergrowth, greasewood and sagebrush.
Fair growth of galletta grass.

40.00 N.89°58'E., on a random line, bet. secs. 5 and 8.
Set temp. $\frac{1}{4}$ sec. cor.

80.04 Intersect the cor. of secs. 4, 5, 8 and 9.
Thence

40.02 S.89°58'W., on a true line, bet. secs. 5 and 8.
Over gently rolling land, through scattering undergrowth.
Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap

$$\begin{array}{c} \frac{1}{4} \text{ S } 5 \\ \hline \frac{1}{4} \text{ S } 8 \\ \hline 1920 \end{array}$$

80.04 Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.
The cor. of secs. 5, 6, 7 and 8.
Land, gently rolling; drains NE.
Soil, sandy loam, 4th rate.
No timber.
Undergrowth, greasewood and sagebrush.
Fair growth of galletta grass.

40.00 S.89°58'W., on a random line, bet. secs. 6 and 7.
Set temp. $\frac{1}{4}$ sec. cor.
75.62 Fall 12 lks. S. of the cor. of secs. 1, 6, 7 and 12, on the W. bdy. of Tp., hereinbefore described.
Thence
S.89°57'E., on a true line, bet. secs. 6 and 7.
Over gently rolling land, through scattering undergrowth.

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains.
35.62 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap

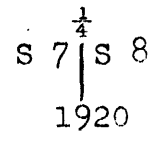
$$\begin{array}{c} \frac{1}{4} S 6 \\ \frac{1}{4} S 7 \\ 1920 \end{array}$$

Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.

75.62 The cor. of secs. 5, 6, 7 and 8.
Land, gently rolling; drains NE.
Soil, sandy, 4th rate.
No timber.
Undergrowth, greasewood and sagebrush.
Fair growth of galletta grass.

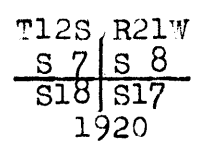
20.00 S.0°3'E., bet. secs. 7 and 8.
Over rolling land, through scattering undergrowth.
Asc. gradual slope.
Ridge, brs. NW. and SE. Desc. gradual slope.

40.00 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap



Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.

80.00 Set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for cor. of secs. 7, 8, 17 and 18, marked on brass cap



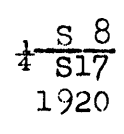
Dig pits, 18 X 18 X 12 ins., in each sec., NE., SE., SW. and NW. of post, 3 ft. dist.
Land, rolling.
Soil, sandy, 4th rate.
No timber.
Undergrowth, greasewood and sagebrush.
Fair growth of galletta grass.

40.00 N.89°58'E., on a random line, bet. secs. 8 and 17.
Set temp. $\frac{1}{4}$ sec. cor.

80.12 Intersect the cor. of secs. 8, 9, 16 and 17.
Thence
S.89°58'W., on a true line, bet. secs. 8 and 17.
Over rolling land, through scattering undergrowth.
Asc. gradual slope.

20.00 Ridge, brs. NW. and SE. Desc. gradual slope.

40.06 Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap



Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.

80.12 The cor. of secs. 7, 8, 17 and 18.
Land, rolling.
Soil, sandy, 3rd rate; beach stones on slopes.
No timber.
Undergrowth, greasewood and sagebrush.

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains.

Fair growth of galletta grass.

40.00

N.89°57'W., on a random line, bet. secs. 7 and 18.

Set temp. $\frac{1}{4}$ sec. cor.

75.64

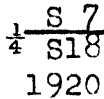
Wall 2 lks. N. of the cor. of secs. 7, 12, 13 and 18, on the W. bdy. of Tp., hereinbefore described.

Thence

S.89°58'E., on a true line, bet. secs. 7 and 18.

35.64

Over gently rolling land, through scattering undergrowth. Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap



Dig pits, 18 X 18 X 12 ins., E. and W. of post, 3 ft. dist.

75.64

The cor. of secs. 7, 8, 17 and 18.

Land, gently rolling.

Soil, 3rd rate; W. 45 chains, sandy; remainder beach stones.

No timber.

Undergrowth, greasewood and sagebrush.

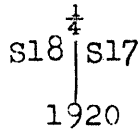
Fair growth of Indian wheat.

40.00

S.0°3'E., bet. secs. 17 and 18.

Over gently rolling land, through scattering undergrowth.

Set an iron post, 3 ft. long, 1 in. diam., 26 ins. in the ground, for $\frac{1}{4}$ sec. cor., marked on brass cap

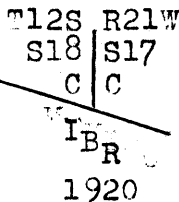


Dig pits, 18 X 18 X 12 ins., N. and S. of post, 3 ft. dist.

55.98

Intersect 60 ft. International Boundary Reserve, which brs. N.70°20'W. and S.70°20'E.

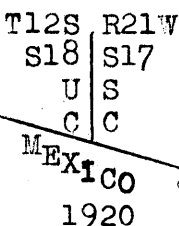
At the point of intersection, set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for Boundary Reserve closing cor. of fractional secs. 17 and 18, marked on brass cap



56.95

Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist. Intersect International Boundary between United States and Mexico, 81.34 chs. N.70°20'W. of Boundary Monument No. 198, hereinbefore described.

At the point of intersection, set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for closing cor. of fractional secs. 17 and 18, marked on brass cap



Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist.

Survey of the Subdivision of Fractional T. 12 S., R. 21 W.

Chains.	<p>Land, gently rolling; drains SW. Soil, 3rd rate. No timber. Undergrowth, greasewood and sagebrush.</p>
2.00 6.00 13.59	<p>From the cor. of secs. 16, 17, 20 and 21, S.89°58'W., bet. secs. 17 and 20. Over mountainous land, through scattering undergrowth. Asc. 65 ft., over E. slope. Ridge, brs. N. and S. Desc. W. slope, 115 ft. Foot of descent, brs. N. and S. Thence over gently rolling land. Intersect 60 ft. International Boundary Reserve, which brs. N.70°20'W. and S.70°20'E. At the point of intersection, set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for Boundary Reserve closing cor. of fractional secs. 17 and 20, marked on brass cap</p> <div style="text-align: center; margin: 10px 0;"> T12S R21W C S17 I B R C S20 1920 </div> <p>Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist. Intersect International Boundary between United States and Mexico, 13.48 chs. N.70°20'W. of Boundary Monument No. 198, hereinbefore described. At the point of intersection, set an iron post, 3 ft. long, 2 ins. diam., 24 ins. in the ground, for closing cor. of fractional secs. 17 and 20, marked on brass cap</p> <div style="text-align: center; margin: 10px 0;"> T12S R21W C U S17 C S S20 MEXICO 1920 </div> <p>Dig pits, 18 X 18 X 12 ins., on each line, 3 ft. dist. Land, mountainous and gently rolling. Soil, sandy and rocky, 4th rate. No timber. Undergrowth, greasewood.</p>
<p>The continued satisfactory adjustment of the solar apparatus during the survey of this fractional Tp. is indicated from field tests as described in Book "F".</p>	
<p style="text-align: center;">GENERAL DESCRIPTION.</p> <p>The central part of this fractional Tp. consists of shifting sand dunes, in quality 4th rate. Along the east bdy. is some fairly good sandy loam soil, 2nd rate. In this portion of the Tp., scattered clearings indicate cultivation, presumably by Indians. The SW. portion of the Tp. has a slightly rolling surface, covered with beach stones.</p> <p>A scattering growth of greasewood and sagebrush is found over the Tp.; also a fair growth of Indian wheat and gallet galletta grass, except in the areas of deep sand.</p> <p>There are no settlers.</p> <p>No water is found in the township.</p> <p>On the largest and northernmost of a chain of small granite hills extending into Mexico, parallel to the International Boundary between United States and Mexico, near the cor.</p>	

of secs. 16, 17, 20 and 21, is located Boundary Monument No. 198, the only International Boundary Cor. within the township.

TEMPORARY CERTIFICATE OF UNITED STATES TRANSITMAN.

I, William D. Wilson, Temporary U.S. Transitman, hereby certify upon honor that, in pursuance of special instructions received from the U. S. Surveyor General, for Group 95, Arizona bearing date of the 10th day of March, 1919, I have well, faithfully, and truly in my own proper person, and in strict conformity with said instructions, the Manual of Surveying Instructions, and the laws of the United States, surveyed all those parts or portions of the

West Boundary and Subdivision Lines of Fractional Township 12 South, Range 21 West

of the Gila and Salt River Base and Meridian, in the State of Arizona, which are represented in the foregoing field notes and by diagram on page 1 hereof as having been executed by me, and under my direction; and that all the corners of said survey have been established and perpetuated in strict accordance with the Manual of Surveying Instructions, and the special written instructions of the U. S. Surveyor General, for Group 95, Arizona, and in the specific manner described in the field notes, and that the foregoing are the original field notes of such survey.

Place, Parkland, Wash.

William D. Wilson Temporary U.S. Transitman

Date, Aug. 15, 1921.

APPROVAL.

OFFICE OF THE UNITED STATES SURVEYOR GENERAL,

, 191

The foregoing field notes of the survey of

executed by

under his special instructions dated, 191, having been critically examined, and the necessary corrections and explanations made, the said field notes, and the surveys they describe, are hereby approved.

U. S. Surveyor General.

I certify that the foregoing transcript of the field notes of the above-described surveys in

, has been correctly copied from the original notes on file in this office.

U. S. Surveyor General.

CERTIFICATE OF UNITED STATES CADASTRAL ENGINEER.

I, William H. Thorn, U.S. Cadastral Engineer, hereby certify upon honor that, in pursuance of special instructions received from the U. S. Surveyor General, for Group 95, Arizona bearing date of the 10th day of March, 1919, I have well, faithfully, and truly in my own proper person, and in strict conformity with said instructions, the Manual of Surveying Instructions, and the laws of the United States, surveyed all those parts or portions of the East and West Boundaries and Subdivision Lines of Fractional Township 12 South, Range 21 West of the Gila and Salt

River Base and Meridian, in the State of Arizona, which are represented in the foregoing field notes and by diagram on page 1 hereof as having been executed by me, and under my direction; and that all the corners of said survey have been established and perpetuated in strict accordance with the Manual of Surveying Instructions, and the special written instructions of the U. S. Surveyor General, for Group 95, Arizona and in the specific manner described in the field notes, and that the foregoing are the original field notes of such survey.

Place, Phoenix Ariz. Date, July 16 1922 William H. Thorn U.S. Cadastral Engineer.

APPROVAL.

OFFICE OF THE UNITED STATES SURVEYOR GENERAL,

Phoenix Arizona Aug. 20 1921

The foregoing field notes of the survey of the East and West Boundaries and Subdivision Lines of Fractional Township 12 South, Range 21 West of the Gila and Salt River Base and Meridian, in the State of Arizona

executed by William H. Thorn, U.S. Cadastral Engineer and William D. Wilson, Temporary U.S. Transitman under special instructions dated March 10, 1919 for Group 95 Arizona, having been critically examined, and the necessary corrections and explanations made, the said field notes, and the surveys they describe, are hereby approved.

Grand D. Groat U. S. Surveyor General.

I certify that the foregoing transcript of the field notes of the above described surveys in has been correctly copied from the original notes on file in this office.