

DOLLYSOD.SCP
-GI

TO: CEORH-CT-C/LS
SFN: 7

SCOPE OF SERVICES

PROJECT: Dolly Sods, WV

SUBJECT: Check Cross-sections of Mapping

General Scope 10/17/95

Services requested shall consist of:

a. Planning, coordination, supervision, field survey crew X,
computations X, drafting X, analysis X.

Job No. 008/6

Work Order No. 40

To establish/and furnish to CEORH-ED-GI

Contractor Woolpert Consultants

1. Horizontal Control

2. Vertical Control

a Base NAD83 (Existing)
b Other Tie Check Sections
Refs/Sketches Sketch Sections
c Final computer List N/A
d Computer Input List N/A
e Org Field notes X
f Draft/Plot/Ink 8-Check Sections
g Computations X
h Plot horiz index N/A
i Log shts X
j Zone SPCSWV NORTH NAD83, NAD27
k EDM Dist Red'ns X
l Field Folder X
m Horiz & Vert Books X
n Polaris Obsv's N/A
o Monuments N/A
p Trig Elev's X
r Comparison N/A
s Analysis N/A
t Other N/A

a Base NAVD88 (Existing)
b Other Profile Check Sections
c Level adj shts X
d TBM Desc shts N/A
e Org Field Notes X
f Draft/Plot/Ink 8-Check Sections
g Fathometer chts N/A
h Computations X
i Profile List X
j Log shts X
k Datum NAVD 1988
l Cross-Sects Plots N/A
m Profile Plots N/A
n Plot Vert BASE N/A
o Monuments N/A
p Sketches/Ref's N/A
q Listing Profiles
r Comparison N/A
s Analysis N/A
t Other N/A

3. All data to be furnished = original + 2 copies with cover sheet in a presentable fashion. 3.5 computer disk with final Check Section data (Coordinates and Elevation listing in ASCII format.

*Note: Provide a sketch of each Check Sections that is profiled. This sketch can be made in the field book provided.



dollysod.SCP

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PROJECT Dolly Sods, WV.

A. SERVICES REQUESTED Mapping Check Sections

1. This request includes all FIELD SURVEYS, drafting, computations, planning and supervision that is necessary for the completion of 8 check sections.
2. Field reconnaissance of the area to locate existing vertical and horizontal control points as shown on furnished topographic sheets/DRAWINGS.
3. Perform the SURVEY and calculations/COMPUTATIONS FOR the Survey. Do not set/establish any new bench marks or control stations unless approved by ED-GI.
 - a. Profile the areas shown on the furnished map sheets, making observation on every even station, (e.g. 0+00, 1+00, etc) and at the major breaks.
4. Review and analyze the data for errors, make appropriate changes.
5. The work is located in Tucker, Randolph and Grant Counties, in the state of West Virginia along the Red Creek River.
6. The location of the Mapping Check Sections may be moved + or - 200 feet in the field at the discession of the Party Chief, as discussed at an Office Meeting held previously with Paul Dean and Jim Tickle of the Corps of Engineers and Lee Poplin and Phil Pettrucci of Woolpert Consultants.

B. Horizontal Control

1. Establish 8 Check Sections as shown on the blue line sheets previously furnished.
2. Station interval will be at major breaks and not to exceed 100 foot intervals.
3. Each Mapping Check Section will have to have Coordinates on the Beginning and Ending points.
4. Horizontal control shall be shown using State Plane Coordinates, West Virginia North Zone. NAD83 will be the Primary Datum and NAD27 will also be shown as a secondary Datum. Vertical Control will be shown using NAVD88 datum. This can be done by using GPS Measurements and Corpscon Software for conversions.

C. Vertical Control

1. Elevations are to be RUN to the nearest 0.10 of a foot, unless establishing control. DO NOT establish any new bench marks without permission or instructions from ED-GI.
2. Establish elevations on all stations along the Check Sections and the major breaks, following the lay of the land.
3. Closure must be of at least 3rd order accuracy, 2nd order class I if establishing a TBM.
4. Establish elevations for all points along the Check Sections by ONE run, with single wire levels, or by trig method with a total station instrument.
5. Do not establish any new bench marks.
6. Balance back-sights/fore-sights when using single wire levels..

D. Vertical Computations

1. Level adjustment sheets will be filled out The only exception will be if a computer program is available which will do the adjustment and print out all the information on the level adjustment sheets.
2. All notes must be checked indicated by check mark and INITIAL at bottom of page.
3. Compile/compute Stations on level adjustment sheets.
4. List datum, NAVD 1988, etc.

F. Field Notes

1. Horizontal

a. Every page must be headed with a book number on right and left pages, as shown in the example notes. The project name and job number should be at the center of the left page. The right page should have the date and the party chief's name and instrument type .

b. Additionally, the right page will show:

(1) Sketch of the baseline and stations.

c. , Additionally, the left page will show:

(1) Identification and type of the points backsighted, occupied and foresighted.

1. Vertical

1. On the right page note where the starting elevation was obtained, repeat information required on 1.(a) above.

2. On the left page, the starting BM identification and elevation. Each point of reference (e.g. monuments, TBM, etc.) turned through should be labeled as shown in the example note.

3. LIST TYPE OF LEVEL USED.

4. Show elevation actually closed with on left hand page.

5. Ring/tab all notes by subject with cover.

6. Keep notes in separate book for horizontal and vertical.

7. Do not mix or crowd notes.

G. Data Summary

1. Data furnished by the Government:

- a. Log Sheets
- b. Field books
- c. Quad Sheets
- d. Blueline Showing Area to be Surveyed
- e. Control Data
- f. Scope of Work

2. Data to be furnished by Contractor:

- A. Report of survey with appropriate discussions.
- D. Original Field Notes Ringed and Tabbed by subject/item
- E. Level Adjustment Sheets,
- F. Log Sheets
- G. Computations Package.
- H. Return all Data Furnished in Field Folder
- I. Listing showing Station and elevation of each point observed on the Check Sections profile.
- J. 3.5 Disk, of Data in ASCII Format'

All data shall be furnished in a package in the same order and in a presentable fashion. Original plus two copies with cover sheets.

H. JOB HAZARD ANALYSIS (JHA)

PRIOR TO THE BEGINNING OF WORK ON THIS WORK ORDER, THE CONTRACTOR SHALL PERFORM AN ANALYSIS OF ALL SAFETY HAZARDS. THE ANALYSIS OF HAZARDS INVOLVED IN EACH STEP OF THE WORK SHALL BE EVALUATED AND THE ACTIONS TO ELIMINATE OR MINIMIZE THE HAZARD SHALL BE IMPLEMENTED.

THE ANALYSIS SHALL BE DOCUMENTED ON ORH FORM 2642. THE COMPLETED JHA SHALL BE SUBMITTED TO THE SURVEY SECTION PRIOR TO BEGINNING OF THE WORK. THIS JHA MUST BE REVIEWED BY ALL EMPLOYEES ASSIGNED TO THE JOB/WORK BEING PERFORMED.

THE ANALYSIS SHOULD COVER THE WORK IN A HORIZONTAL AND VERTICAL CONTROL STATUS.