

Topographic Survey Data

The ancillary TOPODATA file contains topographic survey data for transects B, C, and D by R. Keenan in 1993 and R. Wojcak and M. Busby in 1996. The 1993 survey was conducted using a TopCon total station and prism reflector while the 1996 survey was conducted using a leveling telescope. Because of Keenan's greater experience in surveying and the more precise instrumentation used in the 1993 survey, the Keenan data is probably more accurate than the Busby data. However the Busby data was used in the rim elevation releveling survey presented in files PZELEVB.XLS, PZELEVC.XLS and PZELEVD.XLS in the LEVELS subdirectory. The 1993 data are referenced relative to the BARUCH1932 geodetic benchmark near the intersection of Marsh and Clambank Roads. The most recent published elevation for this benchmark is 2.60 meters above mean sealevel. The 1996 data are referenced to an arbitrary temporary benchmark which, based on regression of the 1996 data against the 1993 data, appears to be 37 cm higher than the BARUCH1932 benchmark. The regression equation relating the two data sets is:

$$Y=1.029*X+37.4$$

where X is the 1993 station elevations and Y is the 1996 elevations. The correlation coefficient is 0.981.

Column 1 gives the transect identifier (B, C, or D). Column 2 gives the station distances in feet from station 000 at the northwest end of each transect. Columns 3 and 5 give 1993 station elevations relative to the BARUCH1932 benchmark in feet and centimeters respectively. Columns 4 and 6 give the 1996 station elevations relative to the arbitrary benchmark in feet and cm respectively. For additional methodology information, see section 2.5.1.3 of the Metadata document.