Two peg test

Introduction

Two Peg Test is a surveying operation carried out to determine whether the leveling bubble and telescope line of sight are parallel.

Objective

Peg Test is a surveying operation carried out to determine if the leveling bubble (bubble axis) and telescope line-of-sight (line of collimation) are parallel.

Tools

- Dumpy level
- Tripod Staff
- Tape Bubble staff

Field Work Procedure

1. Each group is required to perform a peg test to check the instrument.
2. Each person in the group is record the results of the Peg Test in their own field book.
3. Set out and mark on the ground (with wooden pegs driven into the ground) two point some 15 m apart.
4. Instrument is set up midway between two point A and B.
5. Staff is read on each staff point A and point B and the height difference is calculated. Made sure the bubble staff is center
6. Next, instrument is moved about 5m behind the point B. nd staff at point A and point B is read. vii. Record the data.

Result

Point A1 – point B1 = 1. 312 – 1. 310 = 0. 002m Point A2 – point B2 = 1. 239 – 1. 238 = 0. 001m STN 1 – STN 2 = 0. 002 – 0. 001 = 0. 001m = 1mm ? < ± 2mm

Analysis

The error is ±2mm so it can be accepted. The instrument is in good condition and can used in field work.

Conclusion

The instrument can be determined the leveling bubble (bubble axis) and telescope line-of-sight (line of collimation) are parallel.