

Intercomparison of Condensation Particle Counter

Project No.: CPC-2016-1-12

Basic information:

Location of the quality assurance: TROPOS, lab: 130

Delivery date: -

Setup in the laboratory: January 25, 2016

Comparison period: January 25, 2016

| Principal Investigator | Home Institution | Participant | Instrument |
|------------------------|--|-------------|---|
| Alfred Wiedensohler | Leibniz-Institute für Troposphärenforschung Permoserstraße 15 04318 Leipzig Germany | - | DE-TROPOS LE-DAR TSI CPC Model 3025A # 1117 |

TROPOS Reference Instrument: Electrometer: TSI model 3068B
70838596

Additional Equipment:

- Bubble flow meter 'Gilibrator', Gilian (Sensidyne)

Summary of Intercomparison:

Pre-status:

The TSI CPC Model 3025A was in good condition. It is necessary to correct the UCPC with 7% because of the internal flow split problem.

Final status:

The TSI CPC Model 3025A passed the quality standards of ACTRIS and GAW.

On January 25, 2016, the DE-TROPOS LE-DAR 3025A #1117 participated in the TROPOS ACTRIS-2 CPC-Workshop.

1. Status of the wick: The wick was clean.
2. Status of the CPC: The CPC was working properly.
3. Final CPC-Workshop: The TSI CPC Model 3772 reached 93% efficiency at 30 nm. The internal flow split is a general UCPC problem.

final-status: 25.01.2016, Monday

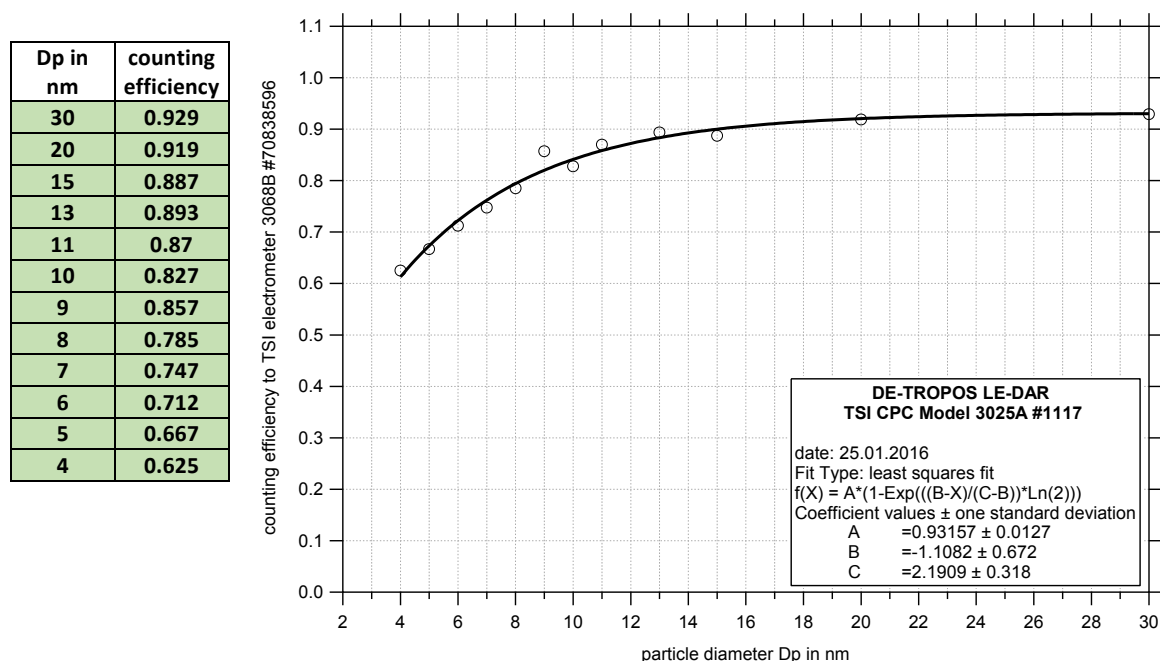


Figure 01: CPC efficiency curve. Based on Electrometer TSI 3068B. Serial number: 70838596