

## Intercomparison of Condensation Particle Counter

Project No.: CPC-2016-4-14a

### Basic information:

**Location of the quality assurance:** TROPOS, lab: 130

**Delivery date:** -

**Setup in the laboratory:** May 17, 2016

**Comparison period:** May 17, 2016

Principal Investigator	Home Institution	Participant	Instrument
A. Wiedensohler	Leibniz-Institut für Troposphärenforschung Permoserstraße 15 04318 Leipzig GERMANY		DE-TROPOS_ARR_SN3772154301

**TROPOS Reference Instrument:** Electrometer: TSI model 3068B  
# 70838596  
Last calibration in April 2016

### **Additional Equipment:**

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

## Summary of Intercomparison:

### **Pre-status:**

**The TSI CPC Model 3772 was in good condition.**

### **Final status:**

**The TSI CPC Model 3772 passed the quality standards of ACTRIS and GAW.**

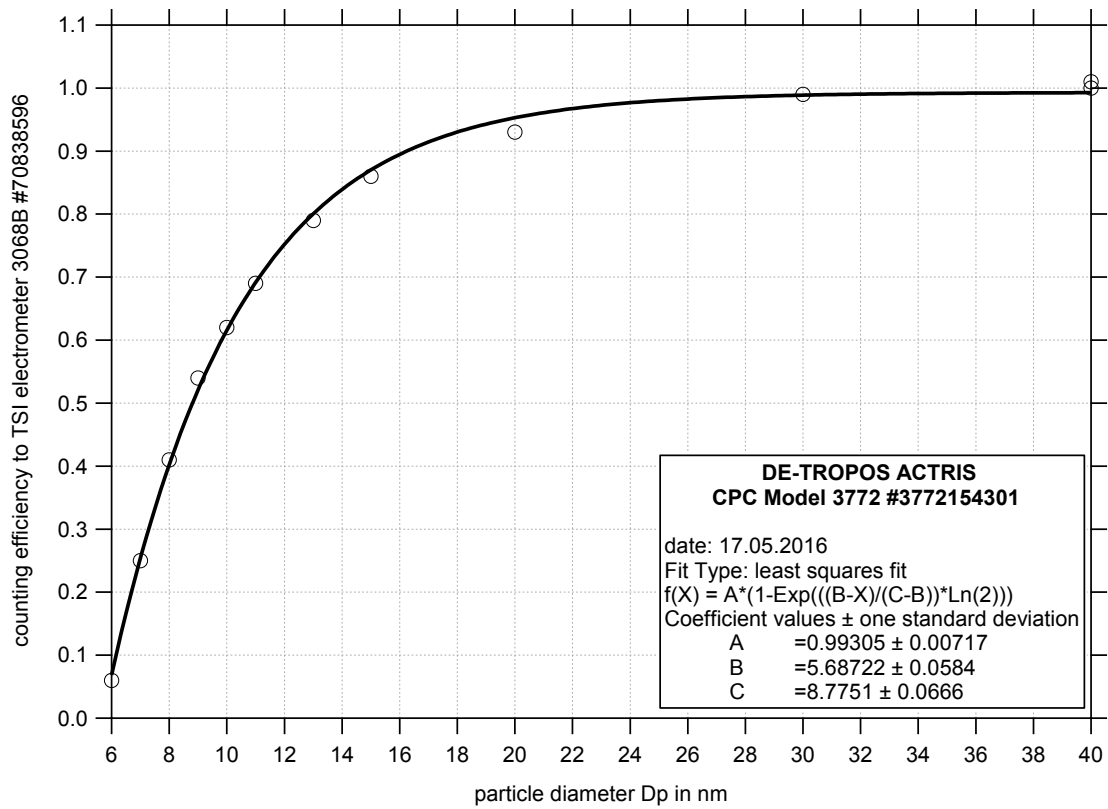
On May 17, 2016, the DE-TROPOS\_ARR\_SN3772154301 participated in the TROPOS ACTRIS-2 CPC-Workshop.

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 100% efficiency at 40 nm. The Dp50 is at 8.77 nm. The CPC efficiency curve corresponds to the standard.

## **final-status: 17.05.2016**

Status	TROPOS ACTRIS SN3772154301
T SAT	39,0
T CON	22,0
T OPT	40,0
T CAB	36,3
P AMB	99,9
P OR	72,0
P NO	2,7
LASER	23mA
LV	full

Dp in nm	counting efficiency
40	1.01
30	0.99
20	0.93
15	0.86
13	0.79
11	0.69
10	0.62
9	0.54
8	0.41
7	0.25
6	0.06



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



## Kalibrierschein

Calibration Certificate

Gegenstand:  
*Object:* Aerosol Elektrometer  
ID-Nummer: TSI\_3068B\_70838596

Hersteller:  
*Manufacturer:* TSI Incorporated

Typ:  
*Type:* 3068B

Kennnummer:  
*Serial No.:* 70838596

Auftraggeber:  
*Applicant:* AG 3.23 - Herr Nowak, Tel.: 3228

Anzahl der Seiten:  
*Number of pages:* 4

Geschäftszeichen:  
*Reference No.:* PTB AG 2.11-1461323527-0327

Kalibrierzeichen:  
*Calibration mark:* 20790 PTB 16

Datum der Kalibrierung:  
*Date of calibration:* 22.04.2016

Im Auftrag:  
*On behalf of PTB:* Braunschweig, 04. Mai. 2016

Im Auftrag:  
*On behalf of PTB:*

391 00B n

Dr. B. Schumacher

Siegel  
*Seal*



C. Rohrig

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