

ISO 17714:2007-07 (E)

Meteorology - Air temperature measurements - Test methods for comparing the performance of thermometer shields/screens and defining important characteristics

Contents		Page
Foreword		iv
Introduction		v
1	Scope	1
2	Terms and definitions	1
3	Field test conditions	2
3.1	Field test site	2
3.2	Respective location of screens	2
3.3	Screens	3
3.4	Thermometers	3
3.5	Additional meteorological variables	3
3.6	Data sampling	4
3.7	Reference values	4
3.8	Quality control	4
3.9	Long-term intercomparison	5
3.10	Typical conditions	5
3.11	Documentation	6
4	Field test methods	6
4.1	Comparability analysis	6
4.2	Global analysis of air temperature	6
4.3	Analysis of extreme values	6
4.4	Statistical analysis of radiation error	7
4.5	Influence of surface albedo	7
4.6	Selection of typical conditions	7
5	Measurement of screen characteristics	8
5.1	Aspiration rate	8
5.2	Internal ventilation factor	8
5.3	Representative height and screen reference point	8
5.4	System response time	8
Annex A (informative) Influence factors		10
Annex B (informative) Examples of useful test-report graphs		13
Bibliography		18