ISO 8573-4:2001-06 (E)

Compressed air - Part 4: Test methods for solid particle content

Contents

Page

Foreword iv

1 Scope 1

2 Normative references 1

3 Terms and definitions 1

4 Units 2

5 Particle classes 2
5.1 Solid particles 2
5.2 Microbiological particles 2
5.3 Aerodynamic particle diameter 2

6 Selection of method 2

7 Sampling techniques 3
7.1 General 3
7.2 Full-flow sampling 3
7.3 Isokinetic sampling 4
7.4 Reducing system pressure before measurement 7
7.5 Average values 7
7.6 Operating conditions 7

8 Measurement methods 7
8.1 General 7
8.2 Laser particle counting 8
8.3 Condensation nucleus counting 8
8.4 Differential mobility analysis 8
8.5 Scanning mobility particle sizing 8
8.6 Sampling on membrane surface in conjunction with a microscope 8

9 Evaluation of test results 8
9.1 Reference conditions 8
9.2 Influence of humidity 9
9.3 Influence of pressure 9
9.4 Influence of temperature 9
9.5 Influence of other contaminants 9

10 Uncertainty 9

11 Test report 9
11.1 Statements 9
11.2 Statement format 10

Annex A (informative) Sample test report on determination of solid particle content in compressed air 11

Annex B (informative) Description of measurement methods 12

Bibliography 14