

DIN EN 17242:2026-05 (E)

Recirculatory Filtration Fume Cabinets

Contents		Page
	European foreword	4
1	Scope	5
2	Normative references	5
3	Terms and definitions	6
4	Classification of RFFC	7
5	Requirements of RFFC	7
5.1	General requirements	7
5.2	Sound pressure level type test	8
5.3	Gas and vapour filtration	8
5.4	High efficiency particulate filtration	9
5.5	Filter monitoring arrangements	9
5.5.1	RFFCs without continuous filter monitoring	9
5.5.2	RFFCs with continuous filter monitoring	9
6	Face velocity measurements	10
7	Performance tests of filtration of a RFFC	10
7.1	Test rooms and test conditions for filtration and containment test	10
7.2	Filtration of gases and vapours	10
7.2.1	General	10
7.2.2	Analysers and detectors	11
7.2.3	Test procedure	11
7.2.4	Gas and vapour filtration test report	16
7.3	Test of gas and vapour sensors	17
7.4	Filtration for particulates	17
8	Containment test with IPA	18
8.1	General	18
8.2	Tracer vapour	18
8.3	Containers	18
8.4	Connecting tubing	18
8.5	Gas analyser	18
8.6	Time constant of the test system	18
8.7	Sampling probe	19
8.8	Sampling manifold	19
8.9	Data recording	19
8.10	Test condition	19
8.10.1	General	19
8.10.2	Positioning the containers to evaporate tracer vapour	19
8.11	Sampling probe grid	19
8.11.1	General	19
8.11.2	Downstream sampling probe grid	19
8.11.3	Outer measurement plane sampling probe grid	21
8.12	Test procedure	22
8.13	Data analysis and results	22
9	Test according to EN 14175-3	23

10	On site testing of RFFC's	24
10.1	General	24
10.2	Test report for commissioning of type tested RFFCs	24
10.3	Test report for routine testing of type tested RFFCs	25
11	Marking	25
12	Product manual	26
	Annex A (normative) Filtration test protocol for inorganic acid filters	28
	Annex B (informative) Information on national and European regulations and guidelines that may impact the usage of RFFCs	29
	Bibliography	31