

 **SECURITON**

SecuriRAS ASD 535

Product Catalogue 2014

Content

1. Aspirating Systems	5
1.1. ASD Base Units.....	5
1.2. Smoke Sensing Devices (SSD)	6
1.3. Expansions & Interfaces.....	7
2. Engineering and Configuration Tools	10
3. Tubes and Fittings for Sampling Pipe.....	11
3.1. PVC Tubes and Fittings.....	11
3.2. ABS Tubes and Fittings.....	14
3.3. Flex Pipe Materials.....	17
3.4. Concrete Inserts.....	18
3.5. Copper Tube Materials	19
3.6. Stainless Steel Tube Materials	21
3.7. Special Tubing Parts	23
4. Sampling Points	24
5. Clamps, Glue and Cleaner	28
6. Accessories	30
7. Spare Parts.....	37
8. Product Type Index	39

Introduction

Aspirating smoke detection systems need little introduction these days: They are deployed extensively and account for more than 10% of the fire detection market in Europe. Aside from this commercial success, the aspirating technology has become the subject of the European product standard EN 54-20. This standard, in conjunction with the latest Code of Practice, will help to ensure that the reliable performance and good reputation of the technique is not eroded by unapproved and inappropriate products. It is strongly recommended that the system designer becomes familiar with these standards and codes.

EN 54-20

EN 54-20 has introduced a fire sensitivity classification system incorporating classes A, B and C. These classes assign the sensitivity at the sampling points to typical applications:

- **Normal Sensitivity:** The same sensitivity as normal optical point detectors (2% - 5% obsc. / m)
- **Enhanced Sensitivity:** Responding to smoke at concentrations between 0.8% and 2% obsc. / m.
- **High Sensitivity:** responding to smoke at concentrations of less than 0.8% obscuration /m.

It is important to define appropriate requirements / expectations for an aspirating smoke detection system at the earliest possible stage for assuring proper system engineering.

Code of Practice

When designing an air sampling system, considerations must be given to the requirements of relevant local Codes of Practice, Standards and Regulations that are used to govern the design of detection systems. What the designer must bear in mind is that these documents may only deal with the minimum acceptable requirements, often related to the performance of conventional point detectors. High sensitivity smoke detection systems such as the ASD 535 can offer performance far in advance of traditional detection elements and various bodies such as the Fire Industry Association (FIA) have documented the related engineering requirements in their "Code of Practice for Design, Installation, Commissioning & Maintenance of Aspirating Smoke Detector (ASD) Systems" (<http://www.fia.uk.com>).

PipeFlow - Engineering Support at your Fingertips

Designing complex piping systems according to EN 54-20 and in line with the local Code can be challenging. Systems may easily become asymmetrical and you may require engineering tools for proper dimensioning and placing of sampling points. We have created the industry's first and only software tool using physical airflow modelling for precise engineering of flow balanced aspirating systems. In plus, PipeFlow lets you draw your system in 3D and delivers you all documents needed for hassle-free installation, testing and commissioning.

How to read this catalogue

Example of a typical entry for an item

Memory Card Module



MCM 35

This Memory Card Module lets you trace up to 18'000 events and logs the measurement data of 80 days. This capability is fixed (ISD cards larger than 1GB will not expand it). The board comes with mounting brackets, screws and ribbon cables, but without SD card.

Type & Article Number

Please quote this number when making an enquiry or ordering

4000285-0101

Technical data

Operating Voltage from AMB 35:	5 V DC
Dimensions (H x W x D) :	95x58x17
Weight:	43 g
Documentation:	T131195

Illustration

Description and technical data

1. Aspirating Systems

1.1. ASD Base Units

ASD Base Units	1 / 2 Channels – with / without Display																					
	ASD 535-1 1 Pipe Circuit / Detector	5000623-0101																				
	ASD 535-2 2 Pipe Circuits / Detectors	5000623-0102																				
	ASD 535-3 1 Pipe Circuit / Detector, 1 Bar graph display	5000623-0103																				
	ASD 535-4 2 Pipe Circuits / Detectors, 2 Bar graph displays	5000623-0104																				
	<p>The SecuriRAS ASD 535 base unit features 1 or 2 flow circuits, whereby each one is equipped by a smoke detector (SSD 535) of choice. The measured smoke level can be indicated on a bar graph display (models -3 and -4). The housing offers room for four expansion or interface boards. Comes without smoke detector.</p>																					
	<p><i>Technical data</i></p> <table> <tr> <td>Mains voltage:</td> <td>10.5 to 30 V DC</td> </tr> <tr> <td>Ambient temperature:</td> <td>-20 °C to + 60 °C</td> </tr> <tr> <td>Protection class:</td> <td>IP 54</td> </tr> <tr> <td>Dimensions (H x W x D) :</td> <td>397 x 265 x 146 mm</td> </tr> <tr> <td>Case cover material:</td> <td>ABS-Blend, UL 94-V0</td> </tr> <tr> <td>Case Colour:</td> <td>grey/anthracite</td> </tr> <tr> <td>Weight:</td> <td>3,85 kg</td> </tr> <tr> <td>Standard / Norm:</td> <td>EN 54-20 Class A, B and C</td> </tr> <tr> <td>VdS-Approval:</td> <td>G208154</td> </tr> <tr> <td>Documentation:</td> <td>T131192 T131193 T131199</td> </tr> </table>		Mains voltage:	10.5 to 30 V DC	Ambient temperature:	-20 °C to + 60 °C	Protection class:	IP 54	Dimensions (H x W x D) :	397 x 265 x 146 mm	Case cover material:	ABS-Blend, UL 94-V0	Case Colour:	grey/anthracite	Weight:	3,85 kg	Standard / Norm:	EN 54-20 Class A, B and C	VdS-Approval:	G208154	Documentation:	T131192 T131193 T131199
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Documentation:	T131192 T131193 T131199																					

1.2. Smoke Sensing Devices (SSD)

Smoke Sensing Devices



SSD 535-1	Main Alarm Sensitivity range 0.5 – 10% /m	5000613-0101
SSD 535-2	Main Alarm Sensitivity range 0.1 – 10% /m	5000613-0102
SSD 535-3	Main Alarm Sensitivity range 0.02 – 10% /m	5000613-0103

The three scattering smoke detectors SSD 535-1/2/3 differ regarding smoke sensitivity. The specification of 0.5, 0.1 or 0.02% refers to the lowest possible setting of the main alarm threshold. Pre-Alarms can be set to 10 times higher sensitivity. Example: The pre-alarm of the SSD 535-3 can be set to 0.002% obscuration per meter.

Technical data

Sensitivity (main-alarm):	0.5/0.1/0.02 %/m – 10 %/m
Operating voltage (from AMB):	5 V DC
Ambient temperature:	-30 °C to + 60 °C
Dimensions (H x W x D):	145 x 95 x 120 mm
Case colour:	grey
Documentation:	T131192

Fastener plate



ASD 535 Verschl

11-2300009-01-01

The fastener plate is for closing the 2nd channel when it is temporarily not used. (e.g. Conversion of a room)

The packaging unit of the fastener plate is 50 pieces.

1.3. Expansions & Interfaces

SecuriLine Module


XLM 35

SecuriLine eXtended

11-2200003-01-01

With the installation of an XLM 35, the ASD aspirating smoke detector can be ideally connected via the addressable loop to the SecuriFire fire alarm systems. The normative alarm transmission to the superordinate FACP is then accomplished via the XLM 35. The board comes with mounting brackets, screws and ribbon cable.

Technical data

Operating voltage from AMB:	5 VDC
Maximum power consumption:	20 mA
Dimensions (H x W x D):	95 x 58 x 17mm
Weight:	56 g
Documentation:	T140088

SecuriLine Module


SLM 35

SecuriLine (standard)

4000286-0101

This loop interface brings faults and alarms to your fire alarm panel and lets you reset the ASD 535 by the panel. Note: ASD configuration is done via USB using ASD config software and a PC. The board comes with mounting brackets, screws and ribbon cable.

Technical data

Operating voltage from AMB 35:	5 V DC
Dimensions (H x W x D) :	95x58x17mm
Weight:	56 g
Documentation:	T131197

Relay Interface Module


RIM 35

5 relays with changeover contacts

4000287-0101

The RIM 35 brings five (5) additional relay outputs to your ASD 535. Expansion limit is two (2) RIM 35 / 10 relays. Each relay can be assigned to any fault, pre-alarm or alarm by programming. The relay board comes with mounting brackets, screws and ribbon cable.

Technical data

Operating Voltage from AMB 35:	5 V DC
Max. relay output load:	50 / 1 / 30 V DC/A/W
Dimensions H x W x D) :	95x58x17mm
Weight:	85 g
Documentation:	T131196

Memory Card Module

MCM 35
4000285-0101

This Memory Card Module lets you trace up to 16 Million events and logs the measurement data of at least 83 days depending on the log interval. This capability is fixed (SD cards larger than 1GB will not expand it). The board comes with mounting brackets, screws and ribbon cables, but without SD card.

Technical data

Operating Voltage from AMB 35:	5 V DC
Dimensions (H x W x D) :	95x58x17mm
Weight:	43 g
Documentation:	T131195

SD memory module

MCM SD-1
4000314-0102

SD memory card 1GB (or higher) to use with MCM 35 (industrial sector).

Technical data

Memory:	1 GB or higher
Temperature range:	- 25°C - + 85°C

Serial Interface Module
RS 485

SIM 35
11-2200000-01-01

For the networking of up to 250 ASD 535 units in an RS 485 bus.

Using the "ASD Config" configuration software, all ASDs in the network can be visualised and operated from a PC

Technical data

Operating voltage from AMB 35:	5 V DC
Dimensions (H x W x D) :	95x58x17
Weight:	56 g
Documentation:	T140011

Serial Master Module
RS 485 / USB

SMM 535
11-2200001-01-01

This interface connects the RS485 (over SIM 35) networked ASDs to a USB port of a PC. It is powered by the USB port.

Technical data

Power Supply:	USB powered / 5 VDC
Operating temperature:	-30°C to +60°C
Dimensions (H x W x D):	82x89x55
Weight:	165 g
Documentation:	T 140010

Universal module support

**UMS 35**

4301252-0101

Universal module support for the attachment of BAO-I3,
SCI 82 and others.

Technical data

Dimensions (H x W x D):	130x11x94
Weight:	60 g

2. Engineering and Configuration Tools

ASD planning and calculation software



ASD PipeFlow

4800107

Planning and calculation software (ASD PipeFlow 2.x for planning symmetric and asymmetric sampling pipe topologies. (Subject to licence)

Technical data (requirements)

Operating system:	Windows XP or Windows Vista
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RAM:	1 GB
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Hard disc space required:	50 MB
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ASD configuration software



ASD Config

4800106

ASD configuration software (ASD Config) for commissioning and maintenance of ASD 535.
Also available as download from the SDT server.

Technical data (requirements)

Operating system:	Windows XP or Windows Vista
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RAM:	1 GB
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Hard disc:	10 MB
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USB cable

USB cable



KAB USB 45

238546

USB 2.0 cable for connection between ASD 535 and PC for commissioning and maintenance via ASD Config

Technical data

Length:	4.5m
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Type:	A-B
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ASD planning and calculation software

ASD PipeFlow Upd

11-2300005-01-03

Update version only for clients which have a valid licence.
Also available as download from the SDT server.

ASD planning and calculation software

ASD PipeFlow Test

11-2300007-01-03

Test version with a runtime of 30 days.
Also available as download from the SDT server.

Visualisation SecuriRas ASD535 and USB Dongle

D&L ASD Vis

VE010960

Visualisation SecuriRas ASD535 and USB Dongle

Visualisation SecuriRas ASD535 without USB Dongle

LIC ASD Vis

VE010961

Visualisation SecuriRas ASD535 without USB Dongle

3. Tubes and Fittings for Sampling Pipe

3.1. PVC Tubes and Fittings

Tube



TU 25 PVC

3220143

Tube to create sampling pipes.

Technical data

Material:	PVC
Colour:	grey
Length:	5 m
Outer Diameter:	25 mm

Flexible Hose



FH 25 PVC

50-0500111-01-01

Flexible hose to create flexible sampling pipes.

Technical data

Material:	PVC, reinforced
Colour:	grey
Outer Diameter:	25 mm

Bend



BE 25 PVC

3220214

Bend for tube TU 25 PVC.

Technical data

Material:	PVC
Colour:	grey
Diameter:	25 mm
Bending radius:	xx mm

Angle



AN 25-90 PVC

3220142

Angle 90° for tube TU 25 PVC. Whenever possible use bend BE 25 PVC because of its lower aerodynamic resistance.

Technical data

Material:	PVC
Colour:	grey
Diameter:	25 mm

Angle

AN 25-45 PVC

Angle 45° for tube TU 25 PVC.

3220150
Technical data

Material:	PVC
Colour:	grey
Diameter:	25 mm

T-piece

TP 25 PVC

T-piece for tube TU 25 PVC or FH 25 PVC.

3220141
Technical data

Material:	PVC
Colour:	grey
Diameter:	25 mm

Cross

CR 25 PVC

Cross for tube TU 25 PVC or FH 25 PVC.

3220292
Technical data

Material:	PVC
Colour:	grey
Diameter:	25 mm

Socket

SO 25 PVC

Socket for tube TU 25 PVC or FH 25 PVC.

3220144
Technical data

Material:	PVC
Colour:	grey
Diameter:	25 mm

Screw-junction piece

SJ 25 PVC

Screw-junction for tubes TU 25 PVC or FH 25 PVC.

3220289

- For tube junctions in deep freeze warehouses in operating state because of the very long cure time in these temperatures.
- Junctions from PVC to ABS can be realized by combination of one SJ 25 PVC and one SJ 25 ABS.

Technical data

Material:	PVC
Colour:	grey
Diameter:	25 mm

End-cap

EC 25 PVC
3220140

End-cap for tube TU 25 PVC or FH 25 PVC.

Technical data

Material:	PVC
Colour:	grey
Diameter:	25 mm

Non-return valve

NV 25 PVC
3220354

Non-return valve for cleaning the aspirating tube by compressed air. Has to be placed at the end of each stub.

Technical data

Material:	PVC
Colour:	grey
Diameter:	25 mm

Compressed-air connection

CC 25 PVC
3220353

Compressed-air connection for tube TU 25 PVC for cleaning the aspirating tube.

Technical data

Material:	PVC
Colour:	grey
Diameter:	25 mm

Ventilation duct flange

DF 25 PVC
3220309

Flange for tube TU 25 PVC for the monitoring of ventilation ducts. Per duct 3 pieces of DF 25 PVC are required, 2 for the aspirating stub, 1 for the air recirculation. Please consider the planning hints.

Technical data

Material:	PVC
Colour:	grey
Diameter:	25 mm

3.2. ABS Tubes and Fittings

Tube



TU 25 ABS

3220269

Tube to create sampling.

Technical data

Material:	ABS
Colour:	beige
Length:	5 m
Diameter:	25 mm

Bend



BE 25 ABS

3220263

Bend 90° for tube TU 25 ABS.

Technical data

Material:	ABS
Colour:	beige
Diameter:	25 mm

Angle



AN 25-90 ABS

3220266

Angle 90° for tube TU 25 ABS. Whenever possible use bend BE 25 ABS because of its lower aerodynamic resistance.

Technical data

Material:	ABS
Colour:	beige
Diameter:	25 mm

Angle



AN 25-45 ABS

3220265

Bend 45° for tube TU 25 ABS.

Technical data

Material:	ABS
Colour:	beige
Diameter:	25 mm

T-piece

TP 25 ABS
3220264

T-piece for tube TU 25 ABS.

Technical data

Material:	ABS
Colour:	beige
Diameter:	25 mm

Socket

SO 25 ABS
3220262

Socket for tube TU 25 ABS.

Technical data

Material:	ABS
Colour:	beige
Diameter:	25 mm

Screw-junction piece

SJ 25 ABS
3610339

Screw-junction for tube TU 25 ABS.

For tube junctions in deep freeze warehouses in operating state because of the very long cure time in these temperatures.

Junctions from ABS to PVC can be realized by combination of one SJ 25 ABS and one SJ 25 PVC.

Technical data

Material:	ABS
Colour:	beige
Diameter:	25 mm

End-cap

EC 25 ABS
3220267

End-cap for tube TU 25 ABS.

Technical data

Material:	ABS
Colour:	beige
Diameter:	25 mm

Non-return valve

NV 25 ABS
3220355

Non-return valve for tube TU 25 ABS for cleaning the aspirating tube by compressed air. Has to be placed at the end of each stub

Technical data

Material:	ABS
Colour:	grey
Diameter:	25 mm

Compressed-air connection

**CC 25 ABS**

3220382

Compressed-air connection for tube TU 25 PVC for cleaning the aspirating tube.

*Technical data*

Material:	ABS
Colour:	grey
Diameter:	25 mm

Ventilation duct flange

**DF 25 ABS**

3220390

Flange for tube TU 25 ABS for the monitoring of ventilation ducts. Per duct 3 pieces of DF 25 ABS are required, 2 for the aspirating stub, 1 for the air recirculation. Please consider the planning hints.

Technical data

Material:	ABS
Colour:	grey
Diameter:	25 mm

3.3. Flex Pipe Materials

Flexible tube



FT 21 PA

0300143

Flexible tube for sampling stub flex and equipment monitoring.

Technical data

Material:	PA
Colour:	black
Outer Diameter:	21.2 mm

Self sealing coupling, straight



SC 20ST PA

3220285

Self sealing coupling (straight) to connect flexible tube (FT 21 PA) with a tube TU 25 XXX. To use together with the screw ring AD 20 XXX.

Order for the connection of TU 25 XXX with FT 21 PA (e.g. with T-piece):
TU 25 XXX – TP 25 XXX – AD 20 XXX – SC 20ST PA – FT 21 PA

Technical data

Pipe connection:	25 mm
Material:	PA
Diameter:	M20, 21,2 mm

Self sealing coupling, bent



SC 20BE PA

3220284

Same as SC 20 ST PA but bent.

Technical data

Pipe connection:	25 mm
Material:	PA
Diameter:	M20, 21,2 mm

Screw ring



AD 20 PVC

3220299

AD 20 ABS

3220319

Ring nut to use together with SC 20XX PA. The rings have to be glued into PVC/ABS sockets, T-pieces with diameter 25mm.

Technical data

Pipe connection:	25 mm
Material:	PVC / ABS
Diameter:	M20

3.4. Concrete Inserts

Tube

FT 32C
On demand

Tube for concrete insertion. (To be purchased locally)

Technical data

Material:	PE (KRF 32 M)
Colour:	red
Outer Diameter:	32 mm

T-branch connection

TP 32C
235024

T-branch connection for tube FT 32C.

Technical data

Material:	PVC
Colour:	grey
Outer Diameter:	32 mm

Sampling point, T-piece

SP 32C T
235008

T-piece with sampling point tube for FT 32C.

Technical data

Material:	PVC
Colour:	grey
Outer Diameter:	32 mm

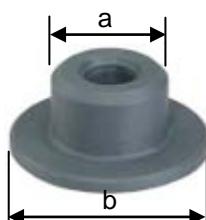
Sampling point, L-piece

SP 32C L
235016

L-piece with sampling point for tube for FT 32C.

Technical data

Material:	PVC
Colour:	grey
Outer Diameter:	32 mm

Sampling rosette

SP 15 PVC
115312

Matching the sampling points SP 32T and SP 32C.

Technical data

Diameter a:	16 mm
Diameter b:	30 mm
Material:	PVC

3.5. Copper Tube Materials

Tube


TU 22 Cu
3220368

Tube to create sampling pipes for the ASD 535.

Technical data

Material:	Cu
Colour:	copper
Outer Diameter:	22 mm
Length:	5m

Bend


BE 22 Cu
3220370

Bend for tube TU 22 Cu.

Technical data

Material:	Cu
Colour:	copper
Outer Diameter:	22 mm
Bending radius:	

T-piece


TP 22 Cu
3220372

T-piece for tube TU 22 Cu.

Technical data

Material:	Cu
Colour:	copper
Outer Diameter:	22 mm

Socket


SO 22 Cu
3220374

Socket for tube TU 22 Cu.

Technical data

Material:	Cu
Colour:	copper
Outer Diameter:	22 mm

Adapter Ø 22 mm – $\frac{3}{4}$ "

AD 22-25 Cu
3220376

Adapter for the junction of tubes TU 25 PVC and TU 22 Cu. To use together with adapter-socket AD 25-Inch PVC.

Technical data

Material:	Cu
Colour:	copper
Outer Diameter:	22 mm

Adapter-socket

AD 25-Inch PVC
3220378

Adapter-socket for the junction of tubes TU 25 PVC and TU 22 Cu. To use together with adapter AD 22-25 Cu.

Technical data

Material:	PVC
Diameter:	25 mm – $\frac{3}{4}$ "

Adapter-socket

AD 25-Inch ABS
3220379

Adapter-socket for the junction of tubes TU 25 ABS and TU 22 Cu. To use together with adapter AD 22-25 Cu.

Technical data

Material:	ABS
Diameter:	25 mm – $\frac{3}{4}$ "

End-cap

EC 22 Cu
3220380

End-cap for tube TU 22 Cu.

Technical data

Material:	Cu
Colour:	copper
Outer Diameter:	22 mm

3.6. Stainless Steel Tube Materials

Tube



TU 22 StSteel

3220369

Tube to create sampling pipes.

Technical data

Material:	Stainless steel
Colour:	grey
Outer Diameter:	22 mm
Length:	6m

Bend



BE 22 StSteel

3220371

Bend for tube TU 22 StSteel.

Technical data

Material:	Stainless steel
Colour:	grey
Outer Diameter:	22 mm

T-piece



TP 22 StSteel

3220373

T-piece for tube TU 22 StSteel.

Technical data

Material:	Stainless steel
Colour:	grey
Outer Diameter:	22 mm

Socket



SO 22 StSteel

3220375

Socket for tube TU 22 StSteel.

Technical data

Material:	Stainless steel
Colour:	grey
Outer Diameter:	22 mm

Adapter

AD 22-25 StSteel
3220377

Adapter for the junction of tubes TU 25 PVC and TU 22 StSteel. To use together with adapter-socket AD 25-Inch PVC.

Technical data

Material:	Stainless steel
Colour:	grey
Outer Diameter:	22 mm

Adapter-socket

AD 25-Inch PVC
3220378

Adapter-socket for the junction of tubes TU 25 PVC and TU 22 StSteel. To use together with adapter AD 22-25 StSteel.

Technical data

Material:	PVC
Diameter:	25 mm – $\frac{3}{4}$ "

Adapter-socket

AD 25-Inch ABS
3220379

Adapter-socket for the junction of tubes TU 25 ABS and TU 22 StSteel. To use together with adapter AD 22-25 StSteel.

Technical data

Material:	ABS
Diameter:	25 mm – $\frac{3}{4}$ "

End-cap

EC 22 StSteel
3220381

End cap for tube TU 22 StSteel.

Technical data

Material:	Stainless steel
Colour:	grey
Outer Diameter:	22 mm

3.7. Special Tubing Parts

Tube



TU 6 PVC

3220302

Tube for sampling stub capillary.

Technical data

Material:	PA
Colour:	grey
Length:	5 m
Outer Diameter:	6 mm
Inner Diameter:	4 mm

Reduction



RE 25-6 PVC

3220307

Reduction 25mm to 6 mm (TU 25 PVC - TU 6 PVC). Has to be glued into T-piece TP 25 PVC.

Technical data

Material:	PVC
Colour:	beige
Diameter:	25 mm

4. Sampling Points

Sampling hole (clip)	Clip x.x PA	
	CLIP 2.0 PA	3220383
	CLIP 2.5 PA	3220384
	CLIP 3.0 PA	3220385
	CLIP 3.5 PA	3220303
	CLIP 4.0 PA	3220304
	CLIP 4.5 PA	3220305
	CLIP 5.0 PA	3220359
	CLIP 5.5 PA	3220386
	CLIP 6.0 PA	3220387
	CLIP 6.5 PA	3220388
	CLIP 7.0 PA	3220389

Sampling hole on aspirating pipe (clip).

Available with different diameter according to the project data.

Only for PVC and ABS pipes with 25 mm diameter

Technical data

Hole diameter	Type
2.0 mm	CLIP 2.0 PA
2.5 mm	CLIP 2.5 PA
3.0 mm	CLIP 3.0 PA
3.5 mm	CLIP 3.5 PA
4.0 mm	CLIP 4.0 PA
4.5 mm	CLIP 4.5 PA
5.0 mm	CLIP 5.0 PA
5.5 mm	CLIP 5.5 PA
6.0 mm	CLIP 6.0 PA
6.5 mm	CLIP 6.5 PA
7.0 mm	CLIP 7.0 PA

Revision clip

	Clip-REV PA	3220306
Clip without hole for revision purpose.		
<i>Technical data</i>		
Pipe connection:		
Material:		

Sampling-funnel



SF ABS

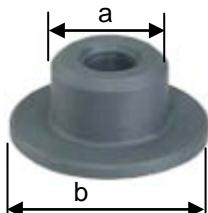
6900284

Sampling-funnel for tubes TU 25XXX. For sampling points exposed to high air current like monitoring of server racks or air conditioners.

Technical data

Pipe connection:	25 mm
Hole diameter:	5 mm
Material:	ABS

Sampling point



SP 36 PVC

3220282

SP 36 ABS

3220318

For tubes TU 25PVC/ABS to create the sampling point type "sampling tube stiff with rosette". Has to be glued into the tubes TU 25PVC or ABS.

Various outer diameters (b) on demand available.

Technical data

Diameter a:	21.5 mm
Diameter b:	36 mm
Material:	PVC / ABS

Sampling point



SP M20 PVC

50-0500080-01-01

SP M20 ABS

50-0500081-01-01

Sampling point for ceiling ducts to connect flex sampling pipe (FT 21 PA.). To connect the flex sampling pipe FT 21 PA. Inclusive self sealing coupling SC 20ST PA.

Technical data

Material:	PVC / ABS
Colour:	white / grey
Diameter:	M20, 36mm

Sampling point



SP M20 PVC-Set

3220360

SP M20 ABS-Set

3220361

Sampling point for ceiling ducts. Complete set incl. T-Piece TP 25XXX, flex sampling pipe (FT 21 PA) and sampling point (SP M20 XXX).

Technical data

Material:	PVC
Length sampling stub:	0.8 m

Capillary Tube Set

SP TU6 PVC Set
50-0500098-01-01

To create the sampling point type "Capillary".
Complete capillary tube-set for the installation in sampling pipes TU 25PVC. Incl. T-piece TP 25 PVC, reduction RE 25-6 PVC and capillary stub 1.5m.

Technical data

Length:	1.5 m
Colour:	gray, RAL 7011
Diameter outside:	6 mm
Diameter inside:	4 mm

Heating nozzle PVC


HEAT 3.0 PVC	red	135135
HEAT 3.5 PVC	blue	135151
HEAT 4.0 PVC	green	135178
HEAT 4.5 PVC	black	135194
HEAT 5.0 PVC	brown	135216

Sampling point with heating (set) to install the aspirating pipe in deep-freeze rooms to prevent the freezing of the aspirating holes. HEAT X.X is the relevant diameter for ASD PipeFlow-calculations (3.0/3.5/4.0/4.5/5.0mm)

Technical data

Pipe connection:	25 mm
Hole Diameter	Type
5,7 mm	HEAT 3.0 PVC
6,1 mm	HEAT 3.5 PVC
6,3 mm	HEAT 4.0 PVC
6,7 mm	HEAT 4.5 PVC
7,1 mm	HEAT 5.0 PVC

Heating nozzle ABS


HEAT 3.0 ABS	red	0.100943
HEAT 3.5 ABS	blue	0.100945
HEAT 4.0 ABS	green	0.100946
HEAT 4.5 ABS	black	0.100948
HEAT 5.0 ABS	brown	0.100950

Same as HEAT X.X PVC but in ABS.

Technical data

Pipe connection:	25 mm
Hole Diameter	Type
5,7 mm	HEAT 3.0 ABS
6,1 mm	HEAT 3.5 ABS
6,3 mm	HEAT 4.0 ABS
6,7 mm	HEAT 4.5 ABS
7,1 mm	HEAT 5.0 ABS

Heat Resistor

Heat-Resistor
135224

Replacement for the heating nozzles HEAT X.X PVC/ABS.

Technical data

Resistor:	220 Ω
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Cable connection fitting set

CCF 25 PVC
135127
CCF 25 ABS
0.100951

Cable connection fitting set for T-junctions of the tubes in deep-freeze rooms.

Technical data

Pipe connection diameter:	25 mm
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Cable white

SLW 0.5 wt (white)
139122
SLW 0.5 bk (black)
139114

 Silicon litz wire 0.5mm² to connect the heating resistors in the heating nozzles HEAT X.X PVC/ABS.

Technical data

Length:	1 m
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Wiring connection unit

WCU 535
5000635.0101

For the introduction of the supply of the heating nozzles into the aspirating tube, with internal clamps. For more details please see the guidelines for deep freeze-warehouses.

Technical data

Dimensions (H x W x D):	80 x 82 x 85 mm
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Material:	PC
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Pipe connection diameter:	25 mm
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Weight:	317g
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5. Clamps, Glue and Cleaner

Pipe clamp


PC 25 PP
3610331

Pipe clamp, type "Goema" for tubes TU 25XXX.

Technical data

Pipe connection:	25 mm
Material:	PP

Pipe clamp


PC 25 PVC
3610332

Pipe clamp, type "IKS" for tubes TU 25XXX.

Technical data

Pipe connection:	25 mm
Material:	PP

Pipe clamp „CLIC“


PC 25 PA
186309

Pipe clamp „CLIC“, type "Egli Fischer" for tubes TU 25XXX.

Technical data

Pipe connection:	25 mm
Material:	PA

Glue


Glue 125 PVC
0600049

Glue to connect the PVC pipes and fittings.

Technical data

Quantity:	125 g
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Glue


Glue 500 PVC
0600108

Glue to connect the PVC pipes and fittings.

Technical data

Quantity:	500 g
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Glue


Glue 1000 PVC
0600109

Glue to connect the PVC pipes and fittings.

Technical data

Quantity:	1000 g
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Glue**Glue 650 ABS**

0600113

Glue to connect the ABS pipes and fittings.

Technical data

Quantity:	650 g
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Cleaner**Cleaner 1000**

0600050

To clean the pipes and fittings (PVC and ABS) before gluing.

Technical data

Quantity:	1 L
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6. Accessories

Detector Box



REK 511

199443

For the localization of a fire in a separate room, when a single ASD is monitoring several rooms. To use together with the SSD 515-Xs smoke detector. Has to be installed in every stub, which leads to a single room from the main tube.

Technical data

Operating voltage:	18-28 VDC
Ambient temperature:	0 °C to + 50 °C
Dimensions (H x W x D):	186 x 122 x 85 mm

Scattered light smoke detector for REK 511



SSD 515-1S sensitivity 1.2%/m

5000604-0101

SSD 515-2S sensitivity 0.6%/m

5000604-0102

SSD 515-3S sensitivity 0.3%/m

5000604-0103

The SSD 515-xS (Scattered Light Smoke Detector) is the smoke sensor for the accessory device REK 511 (full addressing) for the Aspirating Smoke Detector of the ASD and RAS product family. The SSD 515-xS operates according to the scattered light principle and is designed so that it optimally meets the specific requirements of smoke detection in association with an Aspirating Smoke Detector. The detector has alarm threshold tracking and is additionally available with various sensitivities. By choosing the appropriate detector sensitivity, application-specific detection properties of the Aspirating Smoke Detector are possible.

Technical data

Operating voltage:	18 to 28VDC
Ambient temperature:	-20 °C to + 60 °C
Protection class:	IP 44
Case colour:	white
Dimensions (D x H):	80 x 56mm

Filter box small



FBS 25 PC

50-0500143-01-01

Filter box small including filter-mat. Inserted into the sampling pipe before ASD.
To be used in slightly dusty rooms.

Technical data

Dimensions (H x W x D):	80 x 82 x 85 mm
Material:	PC
Pipe connection diameter:	25 mm

Filter mat small for filter box small (5 pcs.)



FBS 25 PC EFM 5er

30-6800022-01-01

Filter-mat for filter box small.
Packaging of 5 pieces

Technical data

Dimensions (H x W x D):	80 x 80 x 20 mm
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Filter box large



FBL 25 PC

6900287

Filter box large including filter-mat. Inserted into the sampling pipe before ASD. To be used in dusty rooms.

Technical data

Dimensions (H x W x D):	120 x 122 x 85 mm
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Material:	PC
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Pipe connection diameter:	25 mm
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Filter mat large for filter box large (5 pcs.)



FBL 25 PC EFM 5er

30-6800024-01-01

Filter-mat for filter box large.
Packaging of 5 pieces

Technical data:

Dimensions (H x W x D):	117 x 80 x 80 mm
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Filter box extra large



FBX 25 PC

0.101196

Filter box extra large including filter-mat. Inserted into the sampling pipe before ASD. To be used in very dusty rooms.

Technical data

Dimensions (H x W x D):	250 x 162 x 91 mm
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Material:	PC
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Pipe connection diameter:	25 mm
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Filter mat set for filter box extra large

Filter-Mat X

0.101949

Filter-mat for filter box extra large.

Technical data

Dimensions (H x W x D) :	155 x 85 x 65 mm
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Dust filter unit large

DFU 535L
6900433

Dust filter unit large.

To be used in dusty rooms. Inserted into the sampling pipe before ASD.

Technical data

Dimensions (H x W x D):	165 x 220 x 220 mm
Material:	steel 37, black
Pipe connection diameter:	40/25 mm
Weight :	1600g

Replacement cartridge for dust filter unit large

DFU 535L RC
6900434

Replacement cartridge for dust filter unit large.

Technical data

Weight :	170g
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Dust filter unit extra large

DFU 535XL
6900435

Dust filter unit extra large.

To be used in very dusty rooms. Inserted into the sampling pipe before ASD.

Technical data

Dimensions (H x W x D):	230 x 250 x 250 mm
Material:	steel 37, black
Pipe connection diameter:	40/25 mm
Weight:	2000g

Replacement cartridge for dust filter unit extra large

DFU 535XL RC
6900436

Replacement cartridge for dust filter unit extra large.

Technical data

Weight:	520g
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Dirt trap box

DTB 25 PC
6900285

Dirt trap box

To be used in very dusty rooms. Inserted into the sampling pipe before dust filter of any type and ASD.

Technical data

Dimensions (H x W x D) :	160 x 250 x 90 mm
Material:	PC
Pipe connection diameter:	25 mm

Dust retaining box



DRB 25 PVC

6900363

The dust and cyclone separator is used as an accessory for aspiration smoke detectors in areas in which a high amount of dust and humidity is present in order to prevent false alarms and also to sub-statically increase the lifetime of the „optical smoke detector“.

When using the dust and cyclone separator we **generally** recommend the combination with the filter box (large). Because the smoke particles are aspirated unhindered despite the usage of such accessories, the fire detection is basically guaranteed.

Technical data

Dimensions (H x W x D):	195 x 420 x 120mm
Material:	PVC

Water retaining box



WRB 25 PVC

6900286

WRB 25 ABS

50-0500057-01-01

Water retaining box standard

Used in rooms with high humidity. Inserted into the sampling pipe before DTB 25 PC (when used), any types of dust filters (when used) and ASD.

Technical data

Dimensions (H x W x D):	335 x 250 x 90 mm
Material:	PC
Pipe connection diameter:	25 mm

Copper Air cooler and water collector



LK 35 – PVC

50-0500122-01-01

LK 35 – ABS

50-0500123-01-01

Is used as an air cooler when the sampling pipe is in a room >60°C. Can also be used as a water separator in rooms with high amount of air humidity. For more details see the technical documentation.

Technical data

Dimensions (H x W x D):	1000 x 730 x 80 mm
Material:	Copper pipe d=22x1 mm
Weight:	8Kg
VdS-Approval:	G208154
CPD-Approval:	0768-CPD-20600

Automatic blow out device

ADB 01A
50-0500131-01-01

The automatic blow-out device ADB-01A is used in areas which are polluted with a high amount of dust- and dirt particles. With the blow-out device, 1 sampling pipe is automatically blown out and cleaned, to prevent fault messages caused by clogged aspiration points and also to avoid false alarms. At the same time, the life-time of the „optical scattered-light-detector“ located in the aspiration system is substantially increased.

Technical data

Mains voltage:	15 to 30 V DC
Pressure connection:	(constant) 4 bar constant
Dimensions (H x W x D):	275 x 380 x 180 mm
Pipe connection diameter:	25 mm

Automatic blow out device

ADB 02
50-0500132-01-01

Same as ADB 01A except: Version for 2 sampling pipes.

Technical data

Mains voltage:	15 to 30 V DC
Pressure connection:	(constant) 4 bar constant
Dimensions (H x W x D):	500 x 500 x 210 mm
Pipe connection diameter:	25 mm

Manual ball valve

MV 25 PVC
3920087
MV 25 ABS
3920097

Manual ball valve for revision and cleaning works with compressed air.

Technical data

Material:	PVC
Pipe connection diameter:	25 mm

Detonation flame arrester

DFA 25-3
0.101557

Detonation flame arrester for explosion zones. Equipment category IIC. 2 pieces are needed per sampling tube. For more details see the technical documentation.

Technical data

Pipe connection diameter:	25 mm
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Detonation flame arrester

DFA 25-2
50-0500084-01-01

Same as DFA 25-3 but equipment category IIB.

Technical data

Pipe connection diameter:	25 mm
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Detonation flame arrester

DFA 25-1
50-0500085-01-01

Same as DFA 25-3 but equipment category IIA.

Technical data

Pipe connection diameter:	25 mm
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Noise reduction housing

Insulation housing
50-0500073-01-01

The noise insulation housing is used as an accessory part for the aspirating smoke detector ASD 535 in areas where a low level of noise is required. If the ventilator noise from the aspirating smoke detector is found to be disruptive and changing the location of the evaluation unit is not possible, the aspirating smoke detector can be integrated into a noise insulation housing.

Technical data

Sound pressure level:	20 dB (A)
Dimensions (H x W x D) :	500 x 500 x 300 mm
Material:	Steel sheet
Weight :	21,5 kg
Protection class:	IP 54

Additional housing for Ex areas

ASD Housing Ex
50-1200001-01-01

The additional housing is designed for the integration of an aspirating smoke detector ASD 535. The additional housing should be used as additional personal protection in explosive areas. If there is danger of operations related damage (e.g. lift truck operations) to the aspirating smoke detector, the additional housing can serve as a mechanical protection measure.

Technical data

Material:	Steel sheet
Dimensions (H x W x D):	500 x 500 x 300 mm
Weight:	21 kg
Protection class:	IP 54

Cleaning Kit

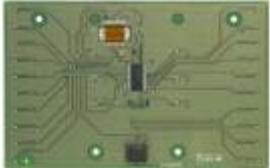
**Cleaning Kit****50-0500062-01-01****Transport case for Cleaning Kit****50-0500095-01-01**

The cleaning kit is generally used for service and maintenance work on aspirating smoke detectors. It is used for cleaning suction pipes that can be blown out and aspirated at high power. Adaptation to the respective suction pipes is possible with the supplied accessory materials.

Technical data

Supply voltage:	230 VAC
Power consumption:	1100 W
Compressed air capacity:	
Air volume" approx.	1500 l/minr
Operating pressure approx	230 mbar
Weight (without accessories):	3400 g

7. Spare Parts

ASD Mainboard		AMB 35-1	4301218-0101
Repair exchange for the ASD 535-1 and -3.			
<i>Technical data</i>			
Dimensions (H x W x D):			125 x 176 x 20 mm
ASD Mainboard		AMB 35-2	4301218-0102
Repair exchange for the ASD 535-2 and -4.			
<i>Technical data</i>			
Dimensions (H x W x D):			125 x 176 x 20 mm
Basic Control Board		BCB 35	4301220-0101
Repair exchange for the standard display unit (without smoke level display)			
<i>Technical data</i>			
Dimensions (H x W x D):			90 x 59 x 9 mm
Advanced Control Board		ACB 35	4301221-0101
Repair exchange for the advance display unit (with smoke level display)			
<i>Technical data</i>			
Dimensions (H x W x D):			90 x 142 x 9 mm
Air Flow Sensor		AFS 35	4000300
Repair exchange for air flow sensor incl. connection wire			
<i>Technical data</i>			
Dimensions (H x W x D):			15 x 14 x 115 mm
Aspirating Fan Unit		AFU 35	4000299
Repair exchange for the aspirating fan unit complete.			
<i>Technical data</i>			
Dimensions (H x W x D):			138 x 185 x 58 mm
Rotary Snap Lock		RSL 35 (Set of 4 pcs.)	4301315-0101
Repair exchange for the ASD 535 body			
<i>Technical data</i>			
Material:			ABS / steel

Insect protection screen (Set 2pcs)

**IPS 35****11-2300012-01-01**

Insect protection screen for the ASD 535 body

Technical data

Material:

steel

8. Product Type Index

A

ACB 35.....	37
AD 20 PVC	17
AD 22-25 Cu	20
AD 22-25 StSteel	22
AD 25-Inch ABS.....	20, 22
AD 25-Inch PVC	20, 22
ADB 01A	34
ADB 02.....	34
AFS 35.....	37
AFU 35.....	37
AMB 35-1	37
AMB 35-2.....	37
AN 25-45 ABS	14
AN 25-45 PVC	12
AN 25-90 ABS	14
AN 25-90 PVC	11
ASD 535 Verschl	6
ASD 535-1	5
ASD 535-2	5
ASD 535-3	5
ASD 535-4	5
ASD Config	10
ASD Housing Ex	35
ASD PipeFlow.....	10
ASD PipeFlow Test.....	10
ASD PipeFlow Upd	10

B

BCB 35.....	37
BE 22 Cu	19
BE 22 StSteel	21
BE 25 ABS	14
BE 25 PVC	11

C

CC 25 ABS	16
CC 25 PVC	13
CCF 25 ABS	27
Cleaner 1000	29
Cleaning Kit	36
CLIP 2.0 PA	24
CLIP 2.5 PA	24
CLIP 3.0 PA	24
CLIP 3.5 PA	24
CLIP 4.0 PA	24
CLIP 4.5 PA	24
CLIP 5.0 PA	24
CLIP 5.5 PA	24
CLIP 6.0 PA	24
CLIP 6.5 PA	24
CLIP 7.0 PA	24
Clip-REV PA	24
CR 25 PVC	12

D

D&L ASD Vis	10
-------------------	----

DF 25 ABS.....	16
DF 25 PVC	13
DFA 25-1	35
DFA 25-2	34
DFA 25-3	34
DFU 535L	32
DFU 535L RC	32
DFU 535XL	32
DFU 535XL RC	32
DRB 25 PVC.....	33
DTP 25 PC	32

E

EC 22 Cu	20
EC 22 StSteel	22
EC 25 ABS	15
EC 25 PVC	13

F

FBL 25 PC	31
FBL 25 PC EFM 5er	31
FBS 25 PC	30
FBS 25 PC EFM 5er	31
FH 25 PVC	11
Filter-Mat X	31
FT 21 PA	17
FT 32C.....	18

G

Glue 1000 PVC.....	28
Glue 125 PVC.....	28
Glue 500 PVC.....	28
Glue 650 ABS	29

H

HEAT 3.0 ABS	26
HEAT 3.0 PVC	26
HEAT 3.5 ABS	26
HEAT 3.5 PVC	26
HEAT 4.0 ABS	26
HEAT 4.0 PVC	26
HEAT 4.5 ABS	26
HEAT 4.5 PVC	26
HEAT 5.0 ABS	26
HEAT 5.0 PVC	26
Heat-Resistor	27

I

IPS 35	38
--------------	----

K

KAB USB 45	10
------------------	----

L

LIC ASD Vis	10
LK 35 - ABS	33
LK 35 - PVC	33

M

MCM 35.....	4, 8
MCM SD-1	8
MV 25 ABS	34
MV 25 PVC	34

N

Noise insulation housing	35
NV 25 ABS	15
NV 25 PVC	13

P

PC 25 PA	28
PC 25 PP	28
PC 25 PVC	28

R

RE 25-6 PVC	23
REK 511	30
RIM 35	7

S

SC 20BE PA	17, 25
SC 20ST PA	17
SF ABS	25
SIM 35	8
SJ 25 ABS	15
SJ 25 PVC	12
SLM 35	7
SLW 0.5 bk	27
SLW 0.5 wt	27
SMM 35	8
SO 22 Cu	19
SO 22 StSteel	21
SO 25 ABS	15
SO 25 PVC	12
SP 32C L	18
SP 32C T	18
SP 36 ABS	25
SP 36 PVC	18, 25
SP M20 ABS	25
SP M20 ABS-Set	25
SP M20 PVC	25
SP M20 PVC-Set	25
SP TU6 PVC Set	26
SSD 515-1S	30
SSD 515-2S	30
SSD 515-3S	30
SSD 535-1	6
SSD 535-2	6
SSD 535-3	6

T

TP 22 Cu	19
TP 22 StSteel	21
TP 25 ABS	15
TP 25 PVC	12

TP 32C.....	18	TU 6 PVC.....	23	WRB 25 ABS.....	33
Transport case for Cleaning Kit.....	36	<i>U</i>		WRB 25 PVC.....	33
TU 22 Cu.....	19	UMS 35.....	9	<i>X</i>	
TU 22 StSteel.....	21	<i>W</i>		XLM 35	7
TU 25 ABS	14	WCU 535	27		
TU 25 PVC.....	11				

