

series 300 LRA 300 MD/HD K



LASER
FUMES



DUST AND
SMOKE



SOLDERING
FUMES



ODORS,
GASES, AND
VAPORS



CLEANING
INDUSTRIAL
GASES



NEW
EMISSIONS



WELDING
FUMES



OIL AND
EMULSION
MISTS



COMPLETE
SOLUTIONS

Date of issue: 04/2015



Extraction. Filtration. Persistence.



Use and application

The **LRA 300 MD/HD K** is suitable for the extraction and filtering of soldering smoke. Soldering processes produce large quantities of soldering smoke (flux residues, gases and vapours as well as other substances) which can be filtered by the LRA 300 MD/HD K. The material of the filter elements ensures effective filtering out of the various dust particle sizes. Provided that the filters are maintained or replaced at regular intervals, the combination of a condensation filter, a preliminary filter, a main filter and of an adsorption filter guarantees a separation efficiency of 99,95 %, due to multiple air cleaning.

Examples

- ➔ hand soldering
- ➔ machines and devices for soldering

ULT 300 mobile extraction and filtration unit

- ➔ mobile unit with castors
- ➔ with filter replacement system
- ➔ control panel on the front side
- ➔ easy filter handling, modular system
- ➔ robust steel housing
- ➔ powder coated
 - vacuum module RAL 7001 silver grey
 - filter module RAL 7035 light grey



Filter system:

Storage filter system

Filters which are replaced once they are saturated.

Filter technology:

Main filter module K

- (1) Expanded metal filter
metal knitting, spark protection filter
- (2) Filter mats M5/F7
filter classes: M5 medium dust filter and F7 fine dust filter according to DIN EN 779
- (3) Combined filter cassette H13A
 - (3.1) Particle filter H13
filter class: H13 HEPA-filter according to DIN EN 1822
 - (3.2) Adsorption filter A
Filter medium: activated carbon



Configuration

Air flow controller: suction power is continuously adjustable

Loaded particle filter indicator: visualization of the particle filter condition

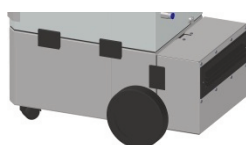
Interface SUB D9: standard configuration: remote ON/OFF, operation status, filter saturation 100%



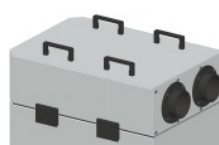
LRA 0300.0-aa.bb.11.6005

Parameter	unit	-MD.14.	-MD.16.	-HD.12.	-HD.13.
Max. air flow	m ³ / hr	635	900	220	400
Max. vacuum	Pa	3.200	3.650	22.000	12.000
Nominal capacity	m ³ /hr / Pa	250 / 2.000	250 / 3.500	120 / 12.000	200 / 7.500
Motor-nominal power	kW	0,36	1,30	1,30	1,30
Nominal voltage	V	1~ 230	1~ 230	1~ 230	1~ 230
Nominal current	A	2,2	10	11	11
Frequency	Hz	50 / 60	50/60	50 / 60	50/60
Protection class	IP	54	54	54	54
Type blower		EC-blower	EC-blower	EC-turbine	EC-turbine
Noise level (at 50 - 100%)	dB(A)	52 - 56	65 - 71	63 - 70	60 - 71
With sound absorber (at 50- 100%)	dB(A)	48 - 51	62 - 65	57 - 67	59 - 68
Air flow controller		yes	yes	yes	yes
Loaded particle filter indicator	optical	yes	yes	yes	yes
SUB D9 interface		yes	yes	yes	yes
Air intake	Ø	ALSIDENT S75 mm; optional: further Ø; number max. 2x			
	position	optional on top or at the backside of the unit			
Air outlet		air exhaust louver, optional Ø 100 mm exhaust nozzle			
	position	lower part of the backside			
Dimensions (Width x Depth x Height)	mm	475 x 585 x 610			
Weight	kgs	ca. 35			
Length of power cable	m	3,0			
Filter system	HFM K	Main filter module			
		filter system: storage filter			
		filter set complete			
		consisting of:			
	(1)	Expanded metal filter			
	(2)	Filter mats M5/F7			
	(3)	Combined filter cassette H13A			
	(3.1)	Particle filter H13			
	(3.2)	Adsorption filter activated carbon			
Options:					
sound absorber	(1*)	changed depth: 745 mm			
exhaust air connection	(2*)	1 x Ø 100 mm			
with additional intake module	(3*)	backside hose connection: Ø75mm; optional further Ø			
with additional intake module	(4*)	ALSIDENT-arm – direct mounting; 1 or 2x S50/75			
mounting bracket for ALSIDENT-arm	(5*)	ULT-U-Profil S50/75; for max. 2 ALSIDENT extraction arms			

(1*)



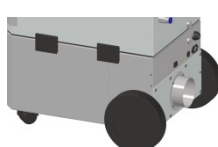
(3*)



(5*)

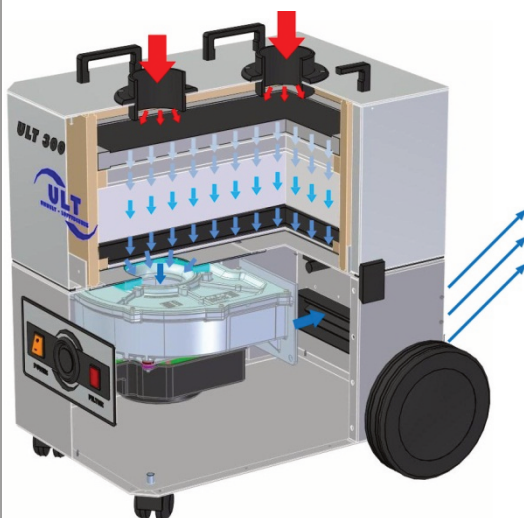


(2*)



(4*)





← raw gas

← filtration

← clean gas

Functional principle:

At the clean-air side of the filter, a vacuum generator with a high pressure reserve produces a volume flow matched to the respective application. This volume flow can be individually and infinitely variably regulated. Thus, the polluted air will be reliably extracted.

The **particles** are separated and held back at the first filtration level in multiple stages. **Gaseous and vaporous air pollutants** are separated (adsorbed) in an activated carbon filter.

The filtering effect of activated carbon is based on adsorption, i. e. an accumulation of substances (to be filtered out) on the surface of the activated carbon. During this process there are no chemical reactions and changes of the captured substances. The construction of the filter elements underlies the air volume of the unit; the contact time is based on a medium adsorption reaction.

Storage filter system

Filters which are replaced once they are saturated.

Main filter module K

- | | |
|-----------------------------|-----------------------|
| (1) spark protection | Expanded metal filter |
| (2) fine dust filter | Filter mats M5/F7 |

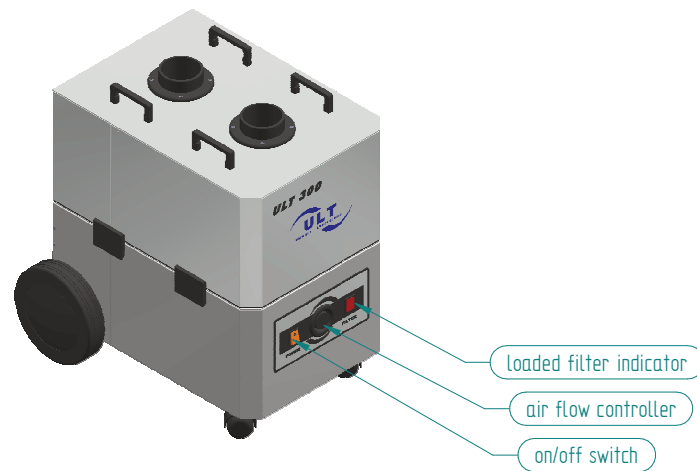
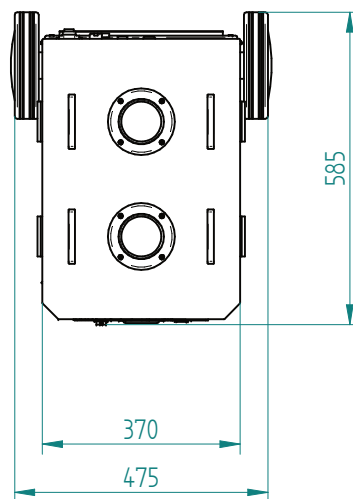
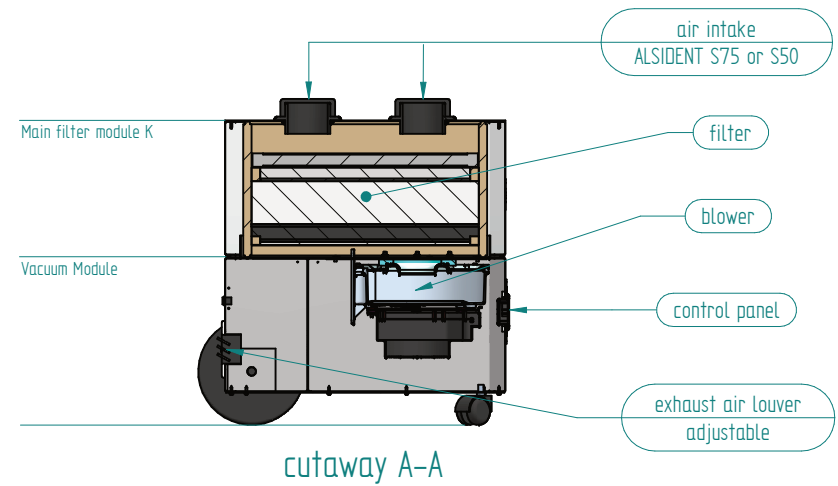
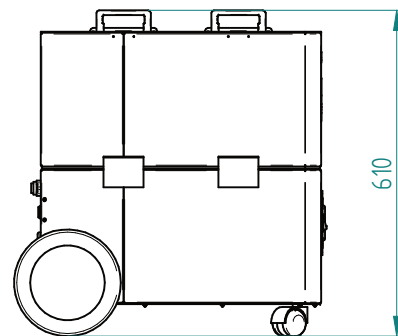
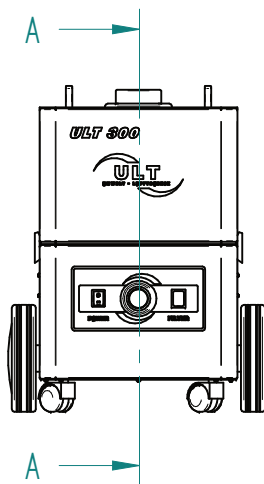
Combined filter cassette

- | | |
|---------------------------------|-------------------------------------------|
| (3.1) particulate filter | HEPA filter H13 |
| (3.2) gas filtration | Adsorption filter A
(activated carbon) |

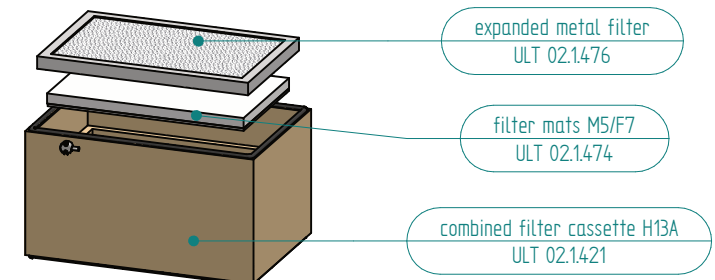
This excellent filter efficiency makes it possible to recirculate the **filtered air** and reduce energy costs.

Further additional options can be connected to the LRA 300 MD/HD K unit. These are to be selected according to the respective requirements.

For the extraction and filtration from pollutants varying from this application case, other module combinations are available.



filter consisting of:



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				ULT AG Am Gopelreich 1 D-02708 Lobau		designation: LRA 300 MD/HD K	
001	Basis	17.04.13	JSACZ	2013	date	name	drawing number:
issue	revision	day	name	edit.	17.04.	JSACZ	ULT 200_00_096
				vert.			scale:
				Norm			1 : 10