

Exhaust Rail System 920

Mechanical system for vehicles in motion



Efficient system for trucks, cars and vans in motion. With damper and shock absorber on trolley and safety coupling on exhaust hose for maximum operational safety. Available with automatic disconnection of the nozzle. The 920/1500 trolley is specially designed for moving vehicles.

The maximum design airflow is 1500 m³/h per trolley.

- Balancers for easier handling of the hose
- Dampers to reduce noise and unnecessary extraction of air when not in use
- · Automatic disconnection and safety devices
- Low sound level
- · Excellent airflow characteristics
- Safety coupling, prevents damage on vehicle
- Automatic disconnection, efficient for vehicles in motion



Exhaust extraction unit with trolley, hose

Trolley	Hose Ø, mm	Hose type*	Hose length, m	Automatic disconnect	Safety coupling & shock absorber	Balancer	Damper	Hose suspension	Part no.
1500	100	NR-CP	6.0		X	Х	Х	X	913120
1500	100	NR-CP	6.0	X	X	Х	Х		913520**
1500	150	NR-CP	6.0		X	Х	Х	X	913320
1500	150	NR-CP	6.0	Х	Х	Х	Х		913720***

^{*} Hose type - see separate brochure **Includes i

Rail kit 920*

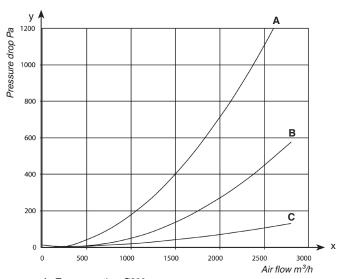
Length, m	Part no.	
2.5	916020	
5	916120	
7.5	916220	
10	916320	
12.5	916420	
15	916520	
17.5	916620	
20	916720	

Length, m	Part no.
22.5	916820
25	916920
27.5	917020
30	917120
35	917220
40	917320
45	917420
50	917520

^{*} Complete with suspension parts, joint connectors, rubber seals, end covers and end stops. For rail lengths > 50 m, please contact your local Nederman dealer.

^{**}Includes nozzle no. 806161 ***Includes nozzle no. 806561

Rail 920 pressure drop



- A= Top connection, Ø200 mm
- B= Side connection, Ø160 mm
- C= Rail 920, per metre

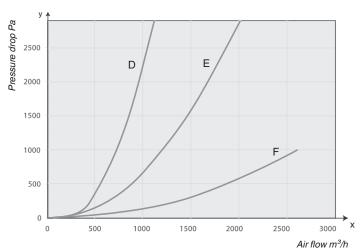
Airflow recommendations

Car: $400-600 \text{ m}^3/\text{h}$ (235–350 cfm) Truck/bus: $1000-1200 \text{ m}^3/\text{h}$ (590–700 cfm)

Accessories	Part no.		
Top outlet Ø 200 mm for 920	374246		
Damper, Ø 100 mm	373752		
Damper, Ø 160 mm	373796		
Balancer kit	373759		
Safety coupling, Ø 100 mm	373797		
Safety coupling, Ø 150 mm	373798		
Motor operated cord return unit max 35 m	801044		
Balancer trolley 920 for extra long hose	374652		
Trolley return unit *	801144		
Balancer for extra long hose	800431		
Balancer for extra long hose	800631		

^{*} See separate technichal leaflet 150022 0 Trolley retun unit

Extraction units and trolley pressure drop



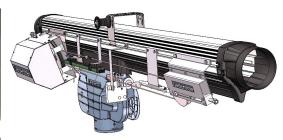
D= Extraction unit – hose 6 m, Ø100 mm, with damper E= Extraction unit – hose 6 m, Ø150 mm, with damper F= Trolley 1500

Max design airflow per trolley

1500 m³/h (885 cfm)



Extra balancer trolley and 831 Balancer for long hose typical 7.5m



Trolley return unit

Functional description



Damper

Shuts the air flow when the unit is not in use.

Automatic function via the balancer or nozzle storage.



Hose suspension

Fastening point of balancer cord – to be mounted on the hose.



Shock absorber

Hydraulic for best efficiency



Balancer trolley

Facilitates assembly of a balancer for extra long hoses, equal to 10 m/33" NR-CP, Ø150/6". For heavier hoses, use suction

trolley with integrated balancer together with balancer trolley 920.



Nozzle

Choose from Nederman's assortment, according to the application of the system



Trolley stop

Mounted on the rail



Safety coupling

Separates the hose if manual/ automatic disconnection fails, or if the nozzle catches on to part of the vehicle.



Automatic disconnection

Disconnection trigger, incl. fixing components, to be installed on



Fan

Choose from Nederman's assortment, according to the application of the system.

Technical Data

Rai

Material: Aluminum: extruded, hardened, non-corrosive

Sealing lips: EPDM rubber; profiled, with inner low-friction layer, delivered in coils according to track length.

End cover: Glass-fiber composite; lid of galvanized sheet metal.

Brackets: Sheet metal; galvanized, with 100 mm threaded rods for alignment.

Heat resistance: 150°C (300°F).

Weight: 6.7 kg/m (29.1 lb/ft), including sealing lips.

Trolley

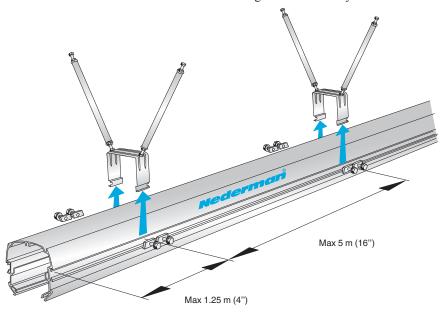
- · Glass-fibre composite.
- Eight running wheels, four guide wheels, all with ball bearings (sealed).
- Resistant to all chemicals in diesel and petrol exhaust.

Environmental data

Sound level	The product, excluding fan, does not generate any sound.		
Recycling level	100 %		
Energy consumption	The product, excluding fan, does not consume any energy.		

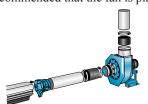
Quick and easy to mount

- Attach brackets to suitable suspension devices.
- · Assemble rail sections on the floor.
- Lift rail sections and "click" them on to the brackets.
- Align rail horizontally with included threaded rods.



Fan connection alternatives

Depending on length of rail and number of extraction units on the rail, there are different connection alternatives and fans to choose. It is recommended that the fan is placed outdoors to give negative pressure in all indoor ducting.



Side connection up to 1200 m³/h

The end cover without lid can be used to connect the ducting to the fan. Connection Ø 160 mm (6,4 $^{\circ}$) in sheet metal, is available.



Top connection up to 2400 m³/h

A connection cone (accessory) is mounted on top of the rail. Connection Ø 200 mm (8"). A hole for the cone, size 85 x 450 mm (3.3" x 17.7"), must be made in the rail.



For more than 2400 m³/h

Top connection with two or more cones (option). Connection \emptyset 200 mm (8").

