



The SAT450HD and SAT950HD are breathing-air purification systems for those working in areas where there is a risk of higher than normal levels of carbon monoxide or carbon dioxide being ingested into the compressed-air system. They are also ideal for use in the outside environment, where the conditions of usage are not known and in accordance with EN12021, the pressure dewpoint should not exceed -11°C.

Both units incorporate compressed-air filtration and drying systems which deliver a smooth, controlled, uninterrupted supply of breathing quality air far exceeding the requirements of EN12021 and a range of international standards. Built to last the units are mounted within a tough polyethylene housing. With virtually no ferrous components the unit incorporates stainless and aluminium components making it suitable to be used in tough and arduous environments. The stainless steel wheeled frame allows the unit to be easily manoeuvred into position.



At the rear of the unit there are the CEJN compatible breathing-air outlets (2 no. on the SAT450HD and 4 no. on the SAT950HD), the pressure being delivered to the user from these outlets can be adjusted via the regulator inside the unit.

## Operation

The compressed-air supply is connected to the input connection on the side of the Safe-Air Trollies, air is then passed through a 25 micron pre-filter and a 0.01 micron oil mist coalescing filter. The air is then delivered to a pneumatically controlled pressure swing dryer incorporating a desiccant media capable of both drying the air to a pressure dewpoint of -40°C and significantly reducing the levels of carbon dioxide. Purge air from this system is exhausted from the cabinet via silencers. The dried air is now passed through a hopcalite catalyst filter which oxidises excess levels of carbon monoxide back to safe levels of carbon dioxide. The air is then finally passed through a carbon filter which protects against potential breakdown in the desiccant media, removes odours and further reduces any oil carryover to less than 0.003ppm.

The systems provide a safe reliable source of breathing quality air in excess of all international breathing standards with the additional confidence of protection against surplus levels of carbon monoxide and carbon dioxide.



SAT450HD with cover removed

SAT950HD with cover removed



## Technical Data

Model	Minimum Operating Pressure	Maximum Operating Pressure	Inlet Flowrate	Maximum Outlet Flowrate	Weight (Kg)	Length (mm)	Width (mm)	Height (mm)	Outlets
SAT450HD	4 barg	16 barg	590 lpm	450 lpm at 7 barg	54	600	560	1040	2 no. CEJN compatible sockets
SAT950HD	4 barg	16 barg	1274 lpm	950 lpm at 7 barg	75	600	560	1040	4 no. CEJN compatible sockets

Minimum recommended inlet temperature = 1.5°C, Maximum recommended inlet temperature = 30°C