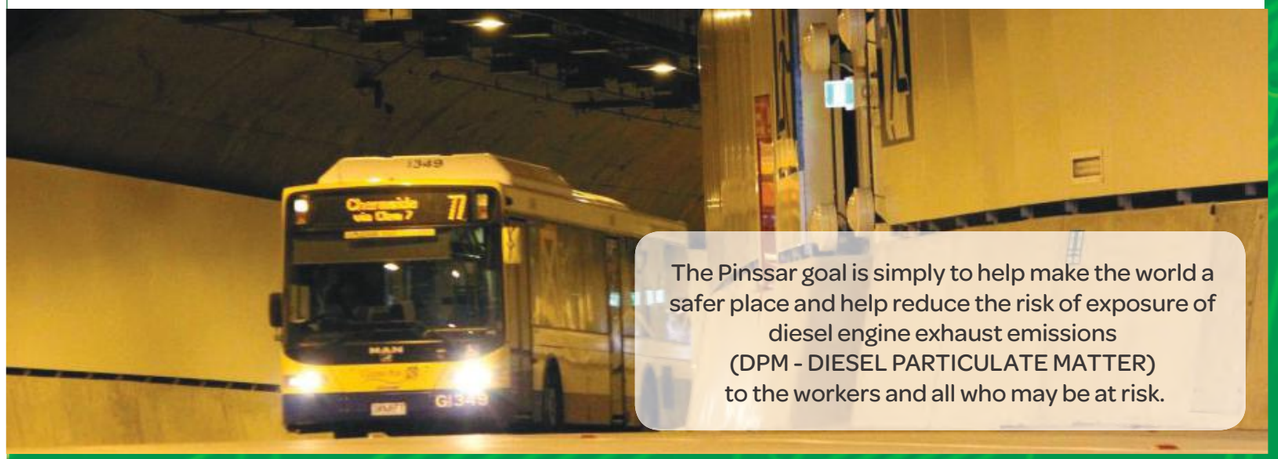
## Helping To Make The World A Safer Place!

Pinssar designs, develops and manufactures air monitoring systems that detect diesel engine exhaust emissions in confined spaces such as tunnels, underground mines and diesel workshops.

The Pinssar new product development team has experience in electronics, communications, and information technology. Pinssar is driven by customer needs and priorities, and the requirement for Pinssar to bring products and services to market that present solutions to problems and reduce risk. The Pinssar project delivery team has skills in mechanical engineering, mining, health and safety, ventilation, and business intelligence software applications.

The Pinssar goal is simply to help make the world a safer place and help reduce the risk of exposure of diesel engine exhaust emissions (DPM - DIESEL PARTICULATE MATTER) to the workers and all who may be at risk.

## The Benefits of Pinssar Air Monitoring Technology

- ✓ Enhancing worker safety with constant (24/7) monitoring of DPM
- ✓ Meeting and/or exceeding company policies
- ✓ Minimising ventilation electricity costs
- ✓ Reducing vehicle maintenance, repair and operational expenses
- ✓ Increasing the effectiveness of deployed emission reducing controls
- ✓ Realising the benefits of adhering to regulatory compliance requirements
- ✓ Gaining access to timely and reliable information for effective decision-making

Corporate House, 2404 Logan Road
Eight Mile Plains, 4113
Brisbane, Queensland
Australia

Tel: +61 7 31181733
Email: info@pinssar.com.au
Web: www.pinssar.com.au
ABN: 35 167 711 622

# PINSSAR Air Monitoring Technology

PINSSAR™
Air Monitoring Technology


## Continuous* DPM Monitoring 24/7!

*24/7 interval based DPM Monitoring

## Helping To Make The World A Safer Place!

Pinssar Air Monitoring Technology helps ensure constant air monitoring of potentially deadly Diesel Engine Exhaust Emissions (DPM - Diesel Particulate Matter) in tunnels, underground mines, diesel engine workshops and all confined spaces.
Continuous Monitoring and Correct Ventilation ensures Greater Health and Safety!

In 2012, when the World Health Organisation (WHO) classified diesel engine exhaust fumes as a carcinogen – a deadly substance that causes cancer, all of a sudden governments around the world, big business and mining industry giants started to address ways to ensure that humans who were subjected to these deadly particles were aware of the amount of particles in their workplace environ. The goal now is to ensure constant monitoring and greater ventilation processes were integrated with the desired outcome of cleaner air and reduced exposure to these deadly elements. The new classification by the WHO moves diesel fuel from the category of "probably carcinogenic" to "carcinogenic", and the widespread and growing use of diesel powered equipment show an elevated (between 20 % and up to 50%) increased risk for people in these environs for prolonged periods, developing cancer.


The Pinssar goal is to make the world a safer place and help reduce the risk of human exposure to potentially deadly DPM (diesel particulate matter) from diesel engine exhaust emissions. Pinssar Air Monitoring Technology helps to ensure reliable monitoring continuously and integrating with greater ventilation processes resulting in safer, cleaner air environs.

Pinssar designs, develops and manufactures monitoring systems and devices that detect the levels of dangerous and harmful diesel fuel emissions in underground mines and a broad range of unique environs. The Pinssar new product development team has extensive knowledge and experience in electronics, communications, and information technology, and also has specialist skills in mechanical engineering, mining, health and safety, ventilation, and business intelligence software applications. Supporting these teams are robust project management methodologies.



## AIR MONITORING - MAKING VENTILATION MORE EFFECTIVE.

The Pinssar Readers in conjunction with other monitoring devices measure particulate and gas concentrations in addition to airflow and temperature readings. This captured data is transferred constantly (24/7) to the monitoring stations via a feeder and communication network. This information is then accessible via the Pinssar dashboard / analytics and data visualisation server.

### How PINSSAR Works

- The Pinssar technology when utilised in hostile environments is superior to any other in the world with particle measurement to less than 800nm'
- The supply of this vital information to the ventilation officer, health and safety professionals, and management, combined with the integrated Pinssar ventilation systems means real time interfacing with all required applications, and increased (if necessary) ventilation-on-demand as well as superior information provision to enable the relevant processes.
- Pinssar can be uniquely customised for specific jurisdictional Code of Practices and Guideline requirements, and has the ability to transmit alerts via SMS and email if diesel emission levels are exceeded.
- Pinssar technology also stores and archives data for analysis and future planning, and produces reports with data averaged over multiple time frames.
- Pinssar can be also be integrated to complement other monitoring programmes and processes such as personnel monitoring.

### PINSSAR Benefits

- The data collected by Pinssar's proven technology enables effective and timely decision-making.
- The instant feedback on the quality and characteristics of the particular specific atmosphere within the identified environ is invaluable and when integrated with a ventilation plan and process ensures greatly reduced risk and Workplace Health and Safety Compliance.
- An integrated plan can potentially dramatically reduce ventilation power overheads.
- The integration of a cohesive plan and process of monitoring and ventilation can also potentially reduce the cost of compliance.
- The Pinssar Reader combined with monitoring devices measure particulate and gas concentrations in addition to airflow and temperature readings.
- Captured data is transferred constantly (24/7) to the central control point via an integrated Pinssar communication network.
- Pinssar's Analytics and Data Visualisation Server turns the data into vital information for constant and reliable monitoring.
- Has applications in the following industries: mining, tunnel constructions and operations, public transport, maritime, defence forces, railways, manufacturing, warehousing and all associated and hostile enclosed environs.

PINSSAR™
Air Monitoring Technology

**The Pinssar range of professional services has been developed to support ventilation implementations and help achieve the desired outcomes of cleaner air.**

## Helping to make the world a safer place!