

MORE THAN **YEARS EXPERIENCE**







30+

10000+

Regional Hubs - UK, Malaysia, UAE

Operators Worked with Worldwide

Sensors Installed in The Oil and Gas Industry



Sense.

Our dynamic technology redefines how sensory information is realised, combining state-of-the-art hardware, intelligent realtime data and secure global connectivity.



Understand.



and make a genuine difference to our clients'

operational performance - supporting informed decision-making and maximising value.

We serve a diverse customer base consisting of Independent and National Oil Companies, as well as Well Service Companies across more than 23 countries in our core regions of the North Sea, Africa, Southeast Asia, and the Middle East.



SMS has established a strong reputation for providing effective management and risk-mitigation strategies for its clients' operational and environmental risks. Our suite of Sand Management and Erosion-Corrosion products and services includes Acoustic Sand Monitoring, Sand Sampling, Erosion & Corrosion Probes, Real-Time UT Wall Thickness Systems, and Real-Time H2S & CO2 Monitoring Systems.

Our team is committed to driving our clients' operational efficiency by offering a comprehensive range of low-carbon solutions and leveraging our zero-manpower capabilities, which have been demonstrated to minimize carbon footprint and accelerate the path to net-zero.

Through the adoption of groundbreaking technologies and partnerships with multiple clients and industry players, we have experienced rapid growth over the years, facilitating the transition to a safer, more robust, resilient, cost-effective, and sustainable asset life cycle.

Industry Sectors



Renewable Energy

 Integrity & Offshore Services



Marine

- · Integrity Services
- Manpower & Equipment



Erosion & Corrosion

- Erosion Sand MonitoringCorrosion MonitoringSand Management Strategy



- Integrity Services
- · Manpower & Equipment



- Well Services
- · Manpower & Equipment



Subsea

· Sand Monitoring

Market segments

Upstream

Exploration, production, well test and maintenance services

Midstream

FPSO maintenance services

Downstream

Refining, blending and maintenance services

SAND MONITORING & SAMPLING

Over time, the presence of sand can lead to equipment and plant damage on a platform. If left unaddressed, it can even result in loss of primary containment, creating a potential risk of explosion and serious injury. Sand erosion can also lead to reduced efficiency, downtime, and lower production in all cases.

To detect the unseen deterioration caused by sand erosion, sensors are essential for monitoring hidden damage and providing real-time data. With quick identification of sand presence, adjustments in production can be made, maintenance reduced, and potential equipment damage minimized.

Accurate monitoring, analysis, and interpretation of realtime data can prolong asset longevity and reduce costly repairs, replacements, and downtime.



SAND MONITORING & SAMPLING SERVICES



Acoustic Sand Monitoring (ASM)

- Non-intrusive design, ideal for HPHT / sour gas application
- Provides an instantaneous response to sand production
- Simple, cost effective and fully portable system

Industry Applications:

- 1. Oil & Gas Upstream
 Operations (Exploration,
 Drilling and Production)
- 2. Mining
- 3. Construction
- 4. Applicable to other industries with sand problems



Online Sand Sampling (OSS)

- Provides solids size distribution and quantification
- Fully portable and closed loop system design
- Flexible hose connection & interchangeable mesh size



SAND MONITORING & SAMPLING SERVICES



Acoustic Sand Detector Calibration System

- Ensure that the detector is accurately measuring the concentration and velocity of sand particles
- Help to optimise production and reduce costs



Sand Injection Calibration

- Enables you to quantify the volume of sand production in your pipeline
- Improves the accuracy of the data used in the integrity evaluation process

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EROSION & CORROSION MONITORING SOLUTION

Periodic evaluations and assessment of erosion and corrosion activities in industrial process systems is essential in detecting metal loss and corrosion rate. This step is critical especially when it involves component that encounter sand-bearing liquids. SMS provides non-intrusive and direct method of monitoring the corrosivity of the fluid and evaluation of corrosion control towards safer and efficient operations.

Real-time erosion and corrosion readings can be acquired to predict wall thickness measurement - when the equipment most likely to become corroded and need to be replaced. The regularity of readings can be tailored to individual needs, depending on the severity of the corrosion and specific environmental circumstances.





Wired RTUT

Real Time UT Wall Thickness Monitoring

- Repeatable reliable improved data accuracy and trending.
- Non-intrusive, ideal for HPHT and sour gas application.
- · Intrinsically safe.
- Wired and wireless options.

Erosion Calculator

- Predict erosion in your pipeline & flowline using globally recognized standards from DNV, Salama or the University of Tulsa
- Data can be used to input into FEED study and for sand risk evaluation



- 1. Oil & Gas Upstream
 Operations (Exploration,
 Drilling and Production)
- 2. Power Generation
- 3. Chemical
- 4. Mining
- 5. Water Treatment Industry
- Applicable to other related industries



Sand Erosion & Corrosion Probe

- Highest sensetivity available on the market
- Elbow mounted design for increased eficiency
- Increased safety through double block barrier

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REAL TIME H2S & CO2 GAS ANALYSER

Sour gas (H2S) can corrode internal surfaces and create a hazardous atmosphere that threatens personnel safety. Early detection and monitoring of H2S is crucial for preventing premature failure and responding to life-critical safety scenarios.

SMS provides clients with two types of H2S gas analyzers. One only measures H2S, while the other measures both H2S and CO2. SMS modular solutions include fully automated sensors capable of accurately analysing H2S, CO2, Methane, Ethane, Propane, and Butane during unmanned operations.

Highly portable and compact, the equipment is suitable for multiple field uses. Our integrated solutions provide customizable real-time data and zero-emission capabilities, supporting sustainable business practices while meeting specific well requirements.

REAL TIME H2S ANALYSER SERVICES

The SMS system is an advanced real-time monitoring solution designed for measuring gas hydrocarbon flow streams. Its automated technology enables accurate and efficient detection of H2S gas levels.



- Real Time H2S monitoring up to 30% volume
- Zero emission sampling reduced environmental risk and personnel exposure to potentially harmful samples
- Provide immediate, real-time information
- Real time integration to end user acquisition system or database

- Natural Gas measurements including processing, transmission, storage and distribution
- 2. Power Generation (turbine, internal combustion engine, fuel cell)
- 3. Truck / Ship / Railcar / Unloading Terminals
- 4. Portable / Temporary analysis
- 5. Flare Gas Monitoring

- 6. Fuel Gas Monitoring
- 7. LNG / LPG / BOG
- 8. Process Industries
- 9. Pipeline Blending
- 10. Gas Plant Inlet
- 11. Acid Gas
- 12. Chemical
- 13. Mining
- 14. Applicable to other related industries

REAL TIME H2S & CO2 GAS ANALYSER SERVICES

A multi-component gas analysis at unparalleled speed that measures methane, ethane, propane, iso-butane, iso-pentane and a combined measurement for (n-butane, n-pentane and n-hexane), as well as percent level H2S and CO2 gas.



- · Remote monitoring
- Zero emission sampling reduced environmental risk and personnel exposure to potentially harmful samples
- Provide immediate, real-time information
- Seamlessly integrate with your current monitoring system
- Specific gravity for accuracy: ±0.5%

- Natural Gas measurements including processing, transmission, storage and distribution
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REAL TIME PARTICLE SIZE & LIQUID ANALYSER

SMS offers in-house services for oil, gas or sand in water measurement. Our Real-Time Particle Size & Liquid Analyzer simultaneously detects and measures solids, oil, and gas concentrations in water. The process is automated thus enhancing personnel safety for both onshore and offshore operations.

By utilizing our Inflow Particle Analyzer, suspended particulate (including sand, water, oil, and gas bubbles) is imaged and analyzed under multiple parameters to determine size, shape, and concentration of Total Suspended Particles (TSS).

It is also a proven alternative to LPSA for Particle Size Distribution especially when sand samples cannot be collected due to the presence of Mercury, H2S or TENORM. Our procedure is safe, repeatable, low-emission, and practical for hazardous environments.



REAL TIME PARTICLE SIZE & LIQUID ANALYSER SERVICES



The online particle size analyser system eliminates manual handling of samples, and this allows clients to obtain live PSD data of online processes that may constitute health hazards such as presence of mercury, NORM, H2S, abnormally high levels of CO2, etc.

Vision-based particle analysis systems typically suffer from the limitation of requiring single-phase liquids, but SMS' system is the first of its kind in the industry as it has the capability to separate water and solids from live streams to allow the visual system to analyser and produce results immediately.

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SAND MANAGEMENT CONSULTANCY

Proactively managing sand for the long-term is essential to prevent unexpected costs. Our value-added approach involves comprehensive investigations into sand activities at the individual well or platform level. SMS engineers have technical expertise in Sand Management and Erosion Modelling.

With over 16 years of experience in sand management strategies for operators, we utilize a systematic approach that includes identifying data gaps, regulatory guidelines, monitoring and inspection, sampling and analysis, well operating guidelines, and providing informed solutions to all focal points.

With an in-depth understanding of the production process, we propose sustainable programs and alternatives to manage sand challenges while facilitating knowledge transfer activities.



SAND MANAGEMENT CONSULTANCY SERVICES

Gap Analysis / System Review

- Review current sand management processes & procedure
- · Identity gaps related to the management of sand
- Present recommendations for closing gaps and improving existing processes and procedures

Sand Management Strategy / Operator Guidelines

- Tailored Sand Management Strategy in accordance with industry best practice
- Installation and maintenance of sand management equipment on operators assets
- Working with operators to achieve a well operating or well bean up guideline where sand s present

Sand Focal Point

- In-house Sand Expert or Sand Management Engineer
- · Remote support for Sand Management
- · Conduct daily, weekly, or monthly reporting



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SMS SMART SOFTWARE

Transform your data into actions using SMS' advanced architectural designs on visualisations and analytics to assess your operational health and potential risk.

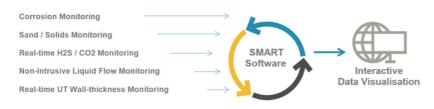
Consolidating your operational data from disparate sources into a single dataset is now simpler. With all your sensors feeding data into a single software, our inhouse visualization suite provides a truly immersive experience - allowing data to be easily collected, connected and integrated seamlessly.

Our platform promotes better collaboration between client's operational team by granting remote access to real-time data while discarding never-ending spreadsheets with uncompromised data integrity.

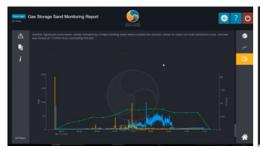
By bringing together the data in both collective and individual views, we let you see the bigger picture, make better decisions and safely maximise production.

INTEGRATED REPORTING

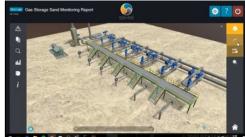
3D Data Visualisation and reporting delivers insight allowing decisions to be made based on real time contextual knowledge and data analysis











Real time monitoring report

Accessible anytime and from anywhere

3D view of sensor locations

ADDITIONAL SERVICES

SMS is dedicated to providing top-notch services and outstanding customer support, at competitive price. We prioritize reliability, efficiency and affordability to ensure that our customers always receive the best value

1 Installation, Maintenance & Troubleshooting

At SMS, we take pride in providing exceptional service to our valued clients, ensuring the operational integrity of their systems while helping to keep them in optimal condition. Our highly trained field engineers are passionate about ensuring the successful installation and operation of your system while meeting the necessary regulatory standards. We understand that supplying high-quality products is only part of the equation, which is why we also offer tailored maintenance programs and troubleshooting services to optimize the life and reliability of your system. With our support available both on-site and remotely, you can have peace of mind knowing that we're here to help you every step of the way - no matter where you are in the world.

2 Training

We recognised that every client has unique needs, which is why we offer flexible alternatives to tailor our services to match your requirements. Our convenient training programs are designed to help you get the most out of our solutions and maximize your return. Our team is dedicated to ensuring that you have the support and resources you need to succeed, and we are always available to help you find the perfect training solution to meet your specific needs. Contact us today to learn more about our customized services.

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