West Africa Research



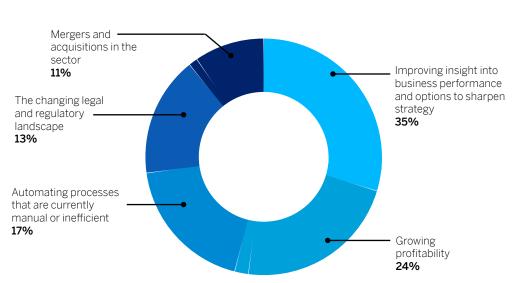
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Research results at a glance

Major challenges for oil, gas and mining companies in West Africa for the year ahead.



Major factors impacting the performance and sustainability of oil, gas and mining companies in West Africa.



38% Rising operational costs



Access to & development of skilled employees



Regulation, legislation & risk management



Market volatility



Fragmented, manual processes

Business priorities for oil, gas and mining companies in West Africa for the year ahead.

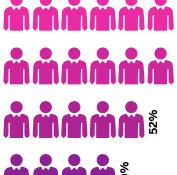


Increasing production



Improving return on capital employed & lowering capital development costs

Tightening governance and risk management





The pressure to perform is on for West Africa's oil, gas and mining sector

SAP commissioned IDG Connect to conduct a survey of decision-makers and influencers at West African oil, gas and mining companies to understand their most pressing challenges and business priorities for the year ahead. In particular, the survey sought to understand:

- •The factors companies in the sector perceive to be impacting the performance and sustainability of their businesses;
- •The business priorities of companies in the sector for the year ahead;
- •The operational areas of the business companies will be investing in;
- •The latest operational trends in the sector;

- •The latest trends around health, safety and environmental standards and business regulations;
- •The ability of companies in the sector to measure performance; and
- •Operational and market trends shaping the sector.

The survey canvassed CIOs, chief technology officers, IT managers, and other IT decision makers at more than 100 companies ranging from small enterprises employing less than 500 people to the largest operations in the sector with workforces numbering thousands. Countries included in the survey were Nigeria, Ghana, Benin, Gambia, Ivory Coast, Cape Verde, Mali, Senegal, Liberia, Burkina, Guinea, Sierra Leone, and Togo.

The survey painted a picture of a vibrant sector that is confidently using technology to address a wide range of business challenges. Companies responding to the survey named the following as their most daunting

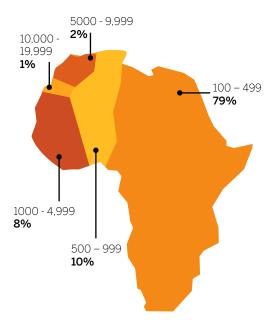
business challenges: rising operational costs; regulation, legislation and risk management; and access to and development of skilled employees.

Survey respondents named increasing operational efficiency and increasing production are the business priorities for the industry in the year ahead. The possibility of merger and acquisition activity and a growing regulatory burden are also top of mind for companies in the sector.

Against this backdrop, it has become ever more important for organisations to wisely leverage technology to drive profitability, improve visibility into business metrics, and streamline their operations, and thereby meet the performance demands of their shareholders.

The survey drew respondents from companies ranging in size from small enterprises to the largest organisations in West Africa's oil and mining industry.

Size of companies represented in this survey







Rising operational costs & growing regulations test West African resource companies

The results of the survey indicate that growing operational costs tops the list of concerns for oil, gas and mining companies of all sizes operating in West Africa. Six out of 10 respondents to the survey named it as a serious or quite serious issue, with mid-sized and large companies especially concerned about it.

Some 59% of respondents rated access to and development of skilled employees as a critical issue, with particularly the smaller and largest companies concerned about

their ability to attract skilled employees. This makes sense, since the smallest companies may struggle to offer the incentives they need to attract the best employees, while the largest organisations have a small skills pool to draw on in most African countries to meet their growing requirements.

Also on the list is regulation, legislation and risk management, regarded as a serious or quite serious issue by 58% of respondents. This topical issue was of concern to companies of all sizes, but especially the larger respondents to the survey, most likely because they attract the closest scrutiny from regulators, legislators and the public.

Market volatility was a serious or quite serious business concern for 45% of respondents. Interestingly, 50% of the midsized companies (500-999 employees) were troubled by market volatility while only 9% of the larger organisations saw it as a major concern

This may indicate that the larger organisations have the economies of scale and cash reserves to weather market volatility. There may also be some difference in the perceptions of the impact of market volatility between companies operating in different segments of the resources market and at different levels of the supply chain, but these are beyond the scope of this study.

Fragmented, manual business processes ranked as a serious or quite serious concern for around 35% of respondents. Across all organisation size categories, about a fifth of respondents saw it as a serious issue. This indicates that while most organisations are far advanced in automating basic business processes, there are still some laggards that need to begin or complete enterprise software rollouts.

Challenges to the performance and sustainability of mining, oil and gas businesses in West Africa



38%



34% Access to & development of skilled employees



34% Regulation, legislation & risk management



23% Market volatility



17% Fragmented, manual processes





Efficiency and production are top of mind

In alignment with the finding that rising operational cost is the largest concern for most companies in the sector, survey respondents named increasing operational efficiency as a key priority for the year ahead. Some 65% named it as a top priority for the year, and a further 28% named it as an important priority for the year to follow.

Increasing operational efficiency was most heavily prioritised among mid-sized businesses (500 to 999 employees), 80% of whom gave it the top priority rating. This is perhaps because these organisations are not yet as mature in their deployment of business solutions as the larger organisations.

Second on the list of priorities was increasing production, given a top priority rating by 62% of respondents and important priority weighting by a further 20%. This priority seemed to be near top of mind for organisations of all sizes, from the very smallest to the largest.

Optimising asset performance ranked as a top priority for 52% of respondents and an important priority for another 20%. This was an important priority across the board, though a slightly higher percentage of smaller companies (54%) highlighted this as a top priority than mid-sized (40%) and large organisations (45%).

Improving return on capital and lowering development costs was a top priority for 40% of respondents. 43% of small and 40% of mid-sized organisations named it as top priority, but only 18% of large organisations highlighted it as a top priority. This is not surprising, given the access to capital and

economies of scale of the bigger companies.

Tightening governance and risk management was top priority for 34% of respondents and important priority for a further 32%. Again, larger companies saw this as less of a priority than mid-sized and small organisaitons, possibly because the regulatory scrutiny to which they are subjected means they already have good systems in place to manage and report on risk and compliance.

Business priorities for West African oil, gas and mining companies for the year ahead

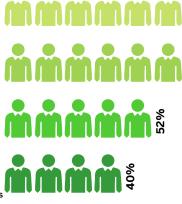
Increasing operational efficiency

Increasing production

Optimising asset performance & utilisation

Improving return on capital employed & lowering capital development costs

Tightening governance and risk management









Organisations target investment at production, sales and marketing

Once again, the key finding about the business areas where companies plan to invest was in line with the obsession with operational efficiency that emerged in other areas of the survey. The key area for investment in the sector appeared to operations and production, named by 53% of respondents overall. Smaller companies were especially eager to invest in operations and production – 56% named it as a key focus area compared to 40% of mid-sized companies and 46% of the larger companies.

The imperative to get product to customers

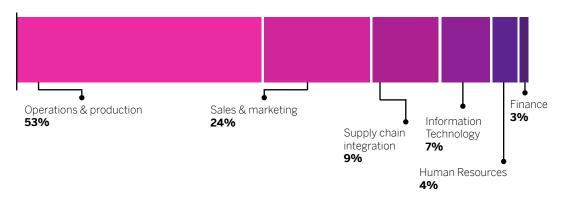
more efficiently, accelerate order processing, improve field sales, and streamline retail network operations, also appears to be receiving attention - sales and marketing was named by 24% of respondents as a key area for investment, placing it second on the list.

Only 9% of respondents in total named supply chain integration as a key issue, but mid-sized companies seemed to be far more concerned about this area than the small and larger organisations. Supply chain integration is an area of investment for 30% of mid-sized companies, but only 9% of small organisations and 8% of large organisations.

All other areas of investment lag way behind the top three – information technology, human resources and finance rated as fairly low priorities for investment across the board. This may indicate that most companies feel that they have these basic areas covered with their existing investments in enterprise solutions.

Nearly a fifth (18%) of large companies (1000 employees-plus) pointed towards information technology as an area of investment. Since the larger organisations may have more mature IT environments, this could indicate that some of them are due to refresh ageing IT systems and applications.

Organisations target investment at production, sales and marketing







A lack of visibility into business performance

The survey asked respondents questions around general trends in the market and their ability to respond to these trends. The overall results indicated that most companies still see some room for investment in processes and systems that will enable them to improve operational efficiency, and that gaining visibility of business metrics is seen as key to this task to help ensure continued growth.

Most companies – 79% of them - are confident that they are in a good position to leverage technologies in discovery, extraction and delivery. This is especially true of large organisations, which were unanimous on this point.

Yet more than two thirds (68%) of respondents also agreed that they lacked visibility into the metrics that enable them to understand how well their businesses are performing. Large organisations felt this pain particularly keenly with 82% answering in the affirmative to the question, compared to 66% of small and 70% of md-sized companies. Respondents were more or less evenly spilt about whether they had achieved levels of operational efficiency that are world-class. 40% of small companies and 55% of the larger organisations were confident about their operational efficiency.

Interestingly, only 5% of mid-sized companies answered that they were confident about their current levels of operational efficiency, perhaps indicating some growing pains in transition to the next level of their business.

Around two thirds of respondents agreed that they expect a lot of merger & acquisition activity in the industry over the coming year.

Most mid-sized companies -90% of them – indicated that they expect merger and acquisition activity – one reason, perhaps, why operational efficiency is on their minds as a major concern.

Eight of 10 larger organisations also responded that they expect to see a lot of mergers and acquisition activity.

Trends shaping the oil, gas and mining sector



79% believe they have achieved levels of operational efficiency that is world-class.



68% are expecting to see a lot of merger & acquisition activity this year and the next.



67% believe they lack visibility into the metrics that allow them to determine how the business is performing.



51% see that their organisation is well-positioned to leverage new technologies in discovery, extraction, and delivery.





Tighter regulations and HSE standards shape the market

Most African economies are aligning themselves more closely with global standards in corporate governance, labour regulation, and health, safety and environmental standards. As a result, the investment landscape is becoming more predictable for resources companies, but with a demand from governments and regulators that organisations in this sector adhere to a tougher and tighter regulatory regime than ever before.

The upshot is that most (93%) respondents to this survey agreed that there would be growing focus on health, safety and environmental standards in their markets

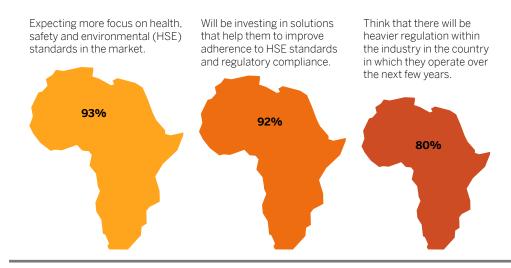
over the short to long term. A similar number (92%) said that they would be investing in solutions that would help them adhere to health, safety and environmental standards.

This is not surprising, given that there is a broad recognition in the market that the health, safety and environmental standards landscape is in flux and compliance can be difficult and expensive. Organisations need to improve global compliance and reduce costs and risks while protecting their brand and introducing a portfolio into new markets and geographies where standards might not be uniform.

Other regulatory burdens are also expected to grow. 80% of respondents agreed with the statement that it seems likely that there will be heavier regulation of their industries in countries they operate in over the next few years. These findings dovetail with the concern that survey respondents expressed about their visibility into key business metrics

and the desire they expressed to sharpen business insight.

The regulatory and HSE landscape







Rattling the supply chain

In a continent with a range of gaps in the communications and transportation infrastructure, efficient supply chain management is paramount for streamlining logistics, boosting agility and reducing costs.

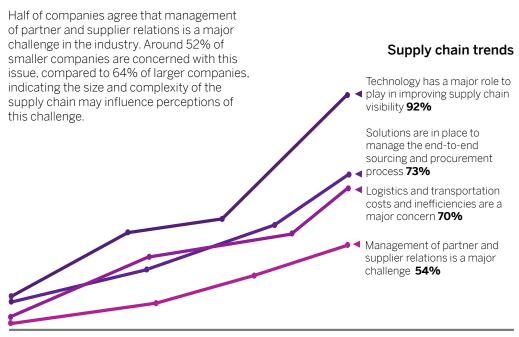
As such, it is not surprising that there was almost unanimous agreement among respondents with the statement that "technology has a major role to play in improving supply chain visibility". Agreement with the statement was high across respondents from organisations of all sizes.

Though the vast majority (73%) said they have solutions in place to manage the end-to-end sourcing and procurement process, 70% still agreed that logistics and transportation costs and inefficiencies is a major concern for the business.

Nine out of 10 large companies reported that they had solutions in place to manage the end-to-end sourcing and procurement process, while 73% reported that they were concerned about logistics costs and inefficiencies.

Two conclusions may be drawn from this: supply chain solutions companies have in place may not always be optimised and that logistics, and transportation infrastructure is in dire need of improvement in many parts of the continent.

Interestingly, only 30% of mid-sized companies have solutions in place to manage the end-to-end sourcing and procurement process while 40% see logistics and transportation costs and inefficiencies as a major concern. This might be because they have largely been focused on inward operational efficiency, as reflected elsewhere in the survey.







Scope for improvement in analysing business performance

Most mining, oil and gas companies in West Africa have put enterprise software backbones in place to streamline and automate key business processes. As a result, they have more data on tap than they ever did before. But how effectively are they able to use this data to understand business metrics that can drive better performance? And how much visibility do they have into the metrics that matter?

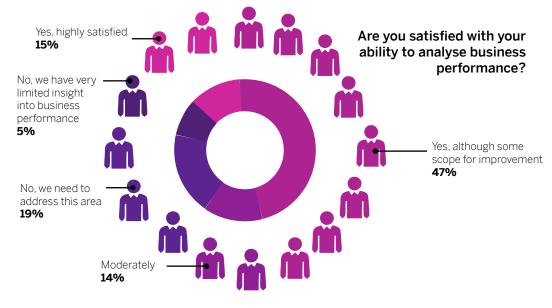
Do they have transparency across their operations to increase efficiency and production? How accurately can they predict

cash flow? Do they have insight into asset deployment that allows them to boost revenue, reduce downtime, and extend asset life? Do they have analytics tools that enable better decision-making across the board?

This survey shows that only 15% of respondent highly satisfied with their ability to analyse business performance while 47% are satisfied but see scope for improvement. Nearly 40% regard their ability to analyse business performance as a moderate to severe problem.

None of the respondents from mid-sized companies were highly satisfied with their capacity in this area – 20% admitted they have very limited insight into business performance, 10% said they needed to address this area and 70% said they had some scope for improvement. This again reflects their status as growing organisations that are acutely aware of the need to put enterprise-class processes and systems in place to the next level.

Larger companies also did not feature among companies highly satisfied with their ability to analyse business performance – they all reported moderate or low satisfaction. One reason for this, perhaps, is that these companies have reached a critical size where business performance analysis is essential in order to ensure continued growth.







Investing in solutions to drive profitability and performance

Oil, gas and mining companies in West Africa operate in a demanding environment, characterised by tight regulation, high operating costs, and growing regulation. The best performing companies in this sector will be those that push the right technology levers to drive innovation and operational efficiency. The survey results reflect that an industry that is acutely aware of the need to invest in technology solutions to boost performance, though organisations of different sizes appear to have vastly different needs and priorities. Investment will be led by mid-sized companies, though their smaller and larger

counterparts also seem to be investment-ready.

Across the board, we can expect to see companies in this sector invest heavily in business intelligence, analytics, compliance and supply chain management solutions as they scramble to improve efficiencies and meet the demands of regulators. With the enterprise backbone in place, many will be looking to exploit leading-edge technology – from in-memory computing to analytics, mobility and cloud – to help maximise performance and minimize costs.

Mid-sized organisations are pondering how to take their businesses to the next level so that they can join the big league. For them, technology investments will be targeted at getting their houses in order ahead of potential mergers and acquisitions. As such, the focus for them is on internal efficiency and the supply chain.

The survey makes it clear that large

organisations have reached the critical mass where growing profitability by driving out inefficiency and harnessing technology is an imperative. Their focuses will include regulatory compliance and business performance analysis.

Smaller organisations, meanwhile, recognise the need to invest in improving insight into business performance and options to sharpen strategy. Many of them will be getting the basics in place to transform into world-class entities and integrate more tightly with the value chains of their larger partners.

