

# The Evolution of Outsourcing and Insourcing in Oil and Gas Accounting

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With fluctuating oil prices, the oil and gas industry is constantly looking for ways to reduce costs. Several companies outsourced their accounting operations in the mid-1990s, but many are now rethinking their decisions to take this plunge.

Many companies have evolved their thinking about back-office outsourcing. In the past, running unique, efficient back-office functions, such as accounting, human resources, or customer care, was considered to be a competitive advantage. However, most companies sustained large, costly departments that developed and maintained in-house proprietary systems. These systems were typically inefficient, comprising loosely connected processes. The introduction of enterprise resource planning (ERP) systems in the early 1990s made an efficient back-office operation a prerequisite. By design, ERP systems impose common processes and link functions that once may have been separated. With common processes and data in place, many set up centralized shared services to gain economies of scale. Companies were able to focus more on front-office operations, where competitive advantage is truly achieved. Subsequently, several firms took the next step by outsourcing their back-office operations to third-party companies. These outsourcers handled similar back-office opera-

tions across many companies, presumably achieving even greater synergies and cost savings for their customers.

Similar trends were seen in the US oil and gas industry, particularly in oil and gas production revenue accounting (PRA). As in other industries, oil and gas companies also once considered an internal, streamlined accounting operation as a competitive advantage. Most oil and gas companies developed and maintained inefficient in-house processes and systems to handle the vast array of functions that make up PRA. As oil and gas companies searched for ways to reduce costs in the 1990s—to counter fluctuating oil and gas prices—back-office accounting was considered to be “low-hanging fruit.” Many also found that ERP systems improved accounting data accuracy and decision making and reduced costs. Production and revenue activities within the US oil and gas industry are complex and can vary significantly, making synergies more difficult to achieve. Production and revenue functions include land management, contracts, pricing, and revenue distribution to interest and royalty owners. In this environment, the skill sets needed to understand and navigate through regulations and laws are unique, and often differ significantly based on geography. ERP systems were designed to handle these complex requirements (**Fig. 1**).



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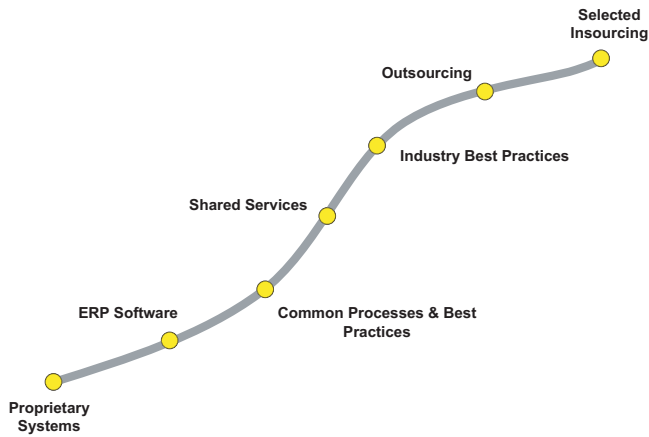
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## Outsourcing in the Oil and Gas Industry

The popularity of ERP systems led to a shift in thinking in the oil and gas industry, and companies looked for ways to streamline PRA operations. Once loosely connected processes and systems were now better connected and more common. Best practices were shared within organizations and even across several oil and gas companies, within the limits of anti-trust laws. Now equipped with common processes, some oil and gas companies set up shared services. The aim of shared services was to deliver common services across a company for economies of scale. With a healthy shared services approach, the philosophy held that oil and gas companies could better focus on their core competencies such as finding and producing reserves, thereby enabling them to make more-efficient use of their accounting resources. Shared services typically were delivered across various geographical boundaries where it made sense, such as the lower 48 US states, Canada, and Alaska. Global shared services for upstream accounting do not achieve the required benefits from economies of scale because of the global laws and regulations relating to interest and royalty owners differ greatly from those of the US.

In the late 1990s, a few companies went further. These companies delegated accounting functions to third-party outsourcers. Counting on general industry acceptance of the same or similar ERP systems and common processes, outsourcing could deliver significant cost reductions by leveraging even fewer human resources needed to deliver



**Fig. 1—The outsourcing evolution in oil and gas.**

accounting services to several companies. In turn, oil and gas companies hoped to attain their goals of reducing costs, improving focus on core competencies, and inevitably worry less about attracting and retaining the talent needed for PRA. In theory, based on complex service agreements, the goal of economies of scale in a grand sense could be achieved.

### Trend Toward Insourcing?

In part because of the dramatic increase in acquisitions and divestitures over the past decade, many oil and gas companies find themselves in unfamiliar waters. Acquisitions of companies often within unfamiliar regions have left some

oil and gas companies captive to both domestic and international pressures. Domestically, they must contend with a strengthened federal and sovereign mandate for a more efficient royalty and revenue collection strategy. Globally, the politics and expectations of national oil companies, coupled with challenging and remote geographic assets, do not often lead to a straightforward staffing approach.

In the past few years, two industry issues have combined to form unease in the oil and gas community about outsourcing accounting functions. These are the growing talent crisis and the rise of oil and natural gas prices. Today, the talent crisis is affecting not only the oil and gas industry, but also outsourcing companies. Outsourcing providers have an increase in the number of less-experienced hires and a commensurate external-cost-reduction campaign in the very areas that are at the vital center of their revenue flow. Having signed complex service agreements with low margins, some outsourced companies have relied on additional fee-based project work to boost margins. Previously, in-house production and revenue accountants were trained in most if not all aspects of the business, including operations. They often began their careers in the field, and they had authority and access to information and relationships. The latest outsourced employees do not typically possess this level of experience or authority.

However, in the past 10 years a substantial maturing of production-capture and PRA technologies has alleviated some pressures caused by talent gaps. Process and technology requirements still vary widely, but with improved technology platforms such as service oriented architecture and the



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improvement in software functionality, the hand-offs between PRA processes can be improved to be tighter and data handled more efficiently. Most oil and gas companies believe that there is still as yet no single software tool that can cover the entire oil and gas value chain. Companies use certain types of tools to account for physical volumes at the wellhead, and others to account for production revenues. For example, the data gathering processes and tools necessary to account for real estate transactions, divisions of interest, and contracts in land management are markedly different from those needed for changes in royalty ownership and revenue distribution. In addition, as oil and gas companies look to diversify through acquisition, they will often switch vendors, technologies, and practices to account more efficiently for their production and revenue. Each acquisition of a smaller upstream company can lead to a fresh look at old processes, and will often mean embracing new and unfamiliar technologies.

### Projections for the Future of Outsourcing

The last decade of outsourcing accounting services has had mixed results in the oil and gas industry. Companies have been able to enjoy important cost savings by outsourcing commoditized tasks, such as purchasing, which allows outsourcing companies to manage their own costs adequately and at the same time provide a quality service. However, outsourcing noncommoditized tasks such as revenue distribution has been more challenging for oil and gas companies. The original strategy of worrying less about recruiting and retaining PRA talent has not been fully realized.

One of the key lessons learned is how to decide which functions can be safely and efficiently outsourced and which should remain in-house. As the market continues to experience a decline in the number of available experienced oil and gas personnel and with the present environment of high oil and gas prices, some accounting functions have become less-ideal candidates for outsourcing. Companies must decide which accounting functions to retain in-house to ensure control for management of risk, data, and relationships. As oil and gas prices increase, there is more potential revenue flow to the royalty owner, and, therefore, more risk associated with data and accounting errors, specifically where master data and production accounting are concerned. Control and management of risk associated with these are increasing in importance. Managing these risks must become part of a larger strategy that balances optimal resource allocation with retaining in-house control of the most sensitive functions and data.

Managing the risks through the entire oil and gas production accounting value chain begins with defining and mapping the transactional and nontransactional accounting processes. Transactional, or commodity, accounting is most often associated with simple revenue accounting for the businesses, while nontransactional processes include proprietary data such as joint-interest billing information, division of interest setups and detailed royalty breakdowns. Lack of control over nontransactional proprietary data holds the greatest risk. Lack of control over core business processes, such as internal production data, production accounting data, divi-

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sion of interest, and royalty data, can lead to negative consequences such as inaccurate data and legal issues.

With this in mind, and having a decade of integrating shared services and outsourcing behind them, many companies are maturing their decision-making process with regard to PRA outsourcing. They have built robust procurement organizations that monitor contracts and strategic sourcing efforts, and have balanced their front-office operations with outsourced services. Most importantly, many companies have learned to optimize their competitive advantage and royalty relationships by evaluating each outsourced accounting function in terms of its strategic importance to the organization. This usually requires a much deeper understanding of current operational performance, not only in the area of cost but also in quality and cycle time.

In addition, oil and gas companies must continue to place a priority on talent by building pools of experienced production-accounting talent, which will help to manage key relationships with the sovereigns and the federal government. Any cost savings that the oil companies may enjoy through outsourcing PRA functions could be undermined by costly data errors and challenging negotiations with government on royalty issues and settlements. In fact, individual states and the federal government are now focusing heavily on revenue payouts. Given the steady rise in both oil and natural gas prices, individual states and the federal government have been ramping up personnel dramatically to ensure their fair share of the royalty claims are paid out. The US government alone oversees more than USD 60 billion of oil and gas production on its lands. This

new focus on capturing royalty payments has shifted the PRA function from its historical role of simple accounting to one of relationship management with government entities.

Given the sense of importance in the industry of production and royalty data, the future will hold a hybrid of outsourcing and strategic insourcing of proprietary and nontransactional functions. The PRA value chain is complex, having numerous data dependencies. Companies must decide for themselves what their appetite is for risk regarding the sharing of master and production data, as well as their production-accounting information, with a third-party outsourcing company.

There are direct benefits to managing this efficiently as a well-balanced PRA portfolio. Given the high price of oil and gas, the functions that are easily outsourced such as transactional activities in the area of revenue accounting will offer a cost-savings advantage when outsourced, even if production and people increase. Some nontransactional areas such as production-data collection, production accounting, and royalty management can be staffed by experienced in-house personnel, with the requisite operational skills, the internal relationships necessary to manage their tasks, and tighter hand-offs of data. Indirect benefits will be felt if the organization supports a more integrated approach to tracking internal issues pertaining to proprietary data and the handling of government negotiations. Managing the more important operational issues, while outsourcing the more mundane accounting tasks, can help control data accuracy and external relationships. The ability to manage these well will become a key measure of success in the future for healthy PRA divisions. **JPT**



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