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"Will My Partners Slow Me Down?" The Effect of Partner Ownership and Experience on Deepwater Project Execution Time

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Abstract

Executing projects on schedule is particularly important in the Deepwater, where massive capital investment coupled with first oil delays has a pernicious impact on project NPV. Oil companies, nevertheless, routinely farm-out equity in order to reduce investment risk, hoping partners will not increase development timing risk. This paper addresses the implications of partner selection on project execution time, thus providing firms a rigorous foundation of knowledge upon which to formulate partnering and portfolio management strategy.

This study is the result of both qualitative and quantitative analysis. The quantitative analysis is presented here, including the design and confirmative testing of a predictive causal model incorporating empirical deepwater joint venture (JV) field data and structural equation modeling (SEM) methods. The database used in this paper included all Deepwater JVs globally.

A number of findings emerged from the statistical analysis, highlighting the impact of partner selection on project delivery time. I found that neither the number of partners within a JV, nor the operator's equity ownership above a controlling interest had a significant effect on first oil timing. Operator experience, however, had a significant beneficial impact on development time, whereas non-operator experience within the JV had no impact. While non-operators may have limited impact on a JV's development speed, the experience non-operators gain within a JV is critical to their effectiveness as future operators. Remarkably, an operator's past non-operational experience is more beneficial to JV project delivery time than their past operational experience. Thus, the best operators have been (and continue to be) active non-operators. These results suggest that the benefits of a diversified holding of operated and non-operated projects include not only fiscal portfolio risk reduction but also enhanced project management.

This study presents quantitative evidence that portfolio risk reduction through equity diversification (i.e., farm-out strategies) does not reduce project value via revenue delays. Furthermore, this research quantifies the benefits of non-operator ownership. Practitioners may find this research useful to optimize their JV portfolios and develop strategies for partner selection. Governments can use these findings to help construct natural resource development policy (lease sale guidelines).

Introduction

What is the impact of control on alliance success? Does the distribution of control within joint ventures (JVs) impact results? Does it matter which partner within a JV controls operations? Economic governance researchers approach this topic from a number of different avenues. Transaction cost economists suggest that alliances are optimized through the reduction of transaction costs (Williamson, 1975, 1985, 1991, 1996). Property rights advocates note that control rights need to be optimally distributed to ensure success (Grossman and Hart, 1986; Hart and Moore, 1990; Hart, 1995; Gibbons, 2004). Both transaction economics and property rights theories provide a foundation upon which to address ongoing JV governance questions within the oil industry. It is possible to recast this economic debate within the construct of oil and gas development to gain insight into JV partner selection and project management optimization. We should note that these economic theories may be particularly applicable to our query, for our industry employs a somewhat unique alliance structure formed under a joint operating agreement (JOA) in which operational control is separated from ownership. This allows us to independently observe the impact of control rights and ownership on a single measure of alliance success (i.e., development timing).

The oil industry is known as a high-risk, high-reward business characterized by fierce competition in early new business development stages and competitive cooperation in later project execution stages (van Diel and Pederson, 2005). This is particularly true in newly discovered regions (or plays) where new technologies and methods are employed. I have