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Oil Pipeline Software

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The authors prepared this case as a basis for class discussion rather than to illustrate either effective or ineffective management. The case describes a real situation, but the facts and numbers have been disguised and any resemblance to actual people or events is unintentional.

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Dave Redfield, Founder and CEO:

I am puzzled by the stagnation of our software business. I love software engineering! I created the group and our clients have never stopped buying. Sure, some of them refuse to upgrade despite the marvelous improvements that our designers keep coming up with but our portfolio can really meet a broad set of needs and we cannot backtrack. Services can definitely help but who saw this drop in oil prices coming? What could have we done differently?

I'll listen to what the accountants have to say about the numbers, but I know our software is solid and if we get out there and sell, clients will buy!

Company Overview

Oil Pipeline Software (OPS) delivers pipeline integrity management software and services to midstream pipeline operators. Pipeline operators utilize OPS' software and services to manage and navigate the regulatory compliance required by the Department of Transportation. OPS was founded as a purely software company in 1992 and for the first 15 years of its life, it was solely focused on selling software products (Exhibit 1: Software Product Highlights). However, in the last 10 years, OPS has significantly grown its Professional Services Division. Professional Services began to assist with software implementation, which was fairly complex for certain products and required the migration of data from legacy software in many cases to new, more advanced software. With the move into integrity management and compliance services, OPS also started diversifying beyond software-related services. In 2011, the Services Division accounted for half of OPS' total revenue and has continued to see significant growth with the hiring of several subject matter experts in the integrity management and compliance fields. By the end of 2015, the Services Division had tripled its revenue and now represented approximately 63% of OPS' total revenue (Exhibit 2: 5-Year P&L).

Organization

OPS is organized in two divisions (Exhibit 3: Sales Mix). The Software Division is a traditional software entity in which OPS develops, maintains, and supports multiple software applications for clients. There are three primary revenue sources for this division: Products, Maintenance and Support, and Software Services. Products and Software Services rely on salesmen to increase their revenue, while all the other lines of business do not employ any sales people. Maintenance and Support is free for the first 12 months after the sale of the software and then clients are billed for a percentage of the software current price. Software service revenue consists of customization of software for clients as well as implementation services for the larger and more complex software products.

The Professional Services Division has three revenue sources: Data Management, Integrity Management, and Compliance. For pipeline operators, data is the foundation of integrity management and compliance programs. These regulations are designed to minimize the impact that the transportation of oil and gas can have on people and the environment. The Compliance group helps to ensure compliance with these regulations, while the Integrity group helps to produce the support and documentation required for compliance. Compliance with these integrity regulations requires the maintenance of specific data regarding pipelines owned by clients, which is facilitated by both OPS' data management services and software products.

Clients of the two divisions are typically departments within the same companies, namely large oil production and exploration corporations such as Chevron, Exxon Mobil, etc. Typically, IT departments are clients of the Software Division and their purchasing decisions depend on the financial resources allocated by clients' capital budgeting processes. Depending on the size and implementation issues of the various software products, prices typically range from \$100,000 to \$500,000. Integrity and Compliance departments are the clients of the Services Division and their purchasing decisions depend on the clients' operating budgets.

Despite the successful growth of the Services Division, Dave is emotionally attached to software upon which OPS was founded. He seems to favor the Software Division when allocating financial resources and is more willing to tolerate poor financial performance if it is related to software.

Industry Trends

The last five years have been marked by substantial growth for OPS in an environment with increasing oil prices (Exhibit 4: Oil Price Trend). The growth happened fast, and OPS struggled keeping up with the evolving demand for software products. Many products have been delivered too soon and have had significant functionality issues reported by clients. To face the growing demand, OPS has been steadily adding newer software without retiring older versions leading to a portfolio of products by the end of 2015 almost twice as large as the portfolio in 2011.

In late 2014, oil prices began tumbling and by the end of 2015, key clients began to have major layoffs and to put significant capital projects on hold. Planned capital projects were cut by several oil companies. 2016 was going to be a tough year and sales were expected to decline. In the fourth quarter of 2015, two major clients decided to not renew their maintenance and support for 2016. Both stated that the services they were receiving were no longer worth the cost given budget constraints in response to the sudden decline in oil prices.

The Financial Review Meeting

Don Sun was hired as Chief Financial Officer at OPS in 2012. Dave hired Don because she was a CPA. At the beginning of June 2016, Don, who was rarely involved in strategic decisions, convinced Dave to schedule a 2-hour meeting for next week to discuss profitability and budgeting. Don's belief is that OPS must start paying a closer look to the performance drivers of the business. Despite the industry trends, Dave pressured Don to develop a budget for 2016 based off sales comparable to 2015 and after much back and forth between Dave and Don, the 2016 budget reflected only modest decreases in sales from 2015 results (Exhibit 5: 2016 Budget; Exhibit 6: Forecast as of May 2016).

To prepare for the meeting, Don summarized the allocation drivers used to calculate margins (Exhibit 7: Allocation Summary; Exhibit 8: Headcount) and asked his team to reflect on the following questions:

- 1) Is the current OPS's portfolio sustainable? If so, how can OPS improve profitability? If not, which line of business should be interrupted?
- 2) What could have OPS done earlier to reduce the pressure on the bottom line? How can OPS better budget for the upcoming years? What actions should OPS consider in response to the occurrence of certain oil price fluctuations?
- 3) What kind of report can OPS prepare to help OPS leadership team to monitor performance on a regular basis?