

16.812 Journal Entry

It seems that one cannot escape from the harsh world of Wall Street. Although harsh is a subjective term, it is the typical reaction someone without a business background would have to Wall Street's methods and way of thinking. However, one cannot see the business world as the enemy. One has to reconcile their stake in an engineering business with that of the engineers and scientists. Once an engineering enterprise can work together with Wall Street, then there may exist a balance and understanding between the stakeholder values of the investor or shareholder with those of the employee or engineer.

In large aerospace enterprises, such as space launches, not appreciating investor stakeholders is akin to business suicide. The business of space has notoriously been unprofitable. Is this the reason why many investors have historically shied away, or is because space enterprises haven't allowed for the investor stakeholders more leverage that the businesses haven't been as successful? The only success stories in space have been communications satellites, such as DirecTV. But even those have really only been able to break even, and have not had large returns on investment. GPS has been the other success story, but that business has grown out of a military application. A large part of the development costs were absorbed by the military and their early use of GPS.

Civil air transport has been even more volatile as a business, with airlines cycling through periods of growth and losses. And growth, although overall steady in the industry, hasn't always been able to counter the huge losses airlines have had. There have been numerous airlines through the last 20 years since deregulation that have folded, such as Pan-Am. However, there have been a few airlines that seem to have been extremely successful in spite of the economic and business cycles, and to have been able to hold a high level of profitability - two examples being Southwest and Jet Blue. Southwest has built a robust, profitable, and efficient business model, and has been able to remain profitable for the last twenty years. Jet Blue is a low-cost airline that has seen extraordinary growth and profitability in its initial years of operation. These two examples show that possibilities exist for businesses to grow and become very profitable, returning value to their investors, in an industry that has seen diminishing returns over the last half-a-century.

These counter examples seem to indicate that the aerospace industry, as a whole, has not been able to assess and offer value to its shareholder and investor partners. The one issue that most employees and engineers in business seem to have is that investor values in an enterprise are at odds with their own. This leads to the obvious conflicts between the investor or business aspect side of the enterprise and the engineer/employee side. It could be that both sides are not able to reconcile each other's means, although their goals may be the same

– that of creating and supporting a successful enterprise. The solution would appear to be to come and work together, understanding the value and expectations each have for their stake in the enterprise, and developing a workable solution for the enterprise to achieve the goals and expectations.