Financing Growth Ventures to Minimize Equity Dilution



An entrepreneurial team's mission is to develop and grow its venture and to optimize the management team's equity ownership stake. Significant growth usually requires substantial development and expansion capital, often in the form of equity investments. These investments take equity from the management team and put it in the hands of the investors who provide the capital for development and growth.

At BioHybrid Technologies and Sensor Technologies, two Shrewsbury, Massachusetts-based high technology startup ventures developing novel ways to treat diabetes, our management team raised over \$50 million of technology development financing without any resulting equity dilution. We raised approximately \$8 million through federal government and private foundation grants. We raised the balance—slightly more than \$46 million—from three corporate



alliances, which funded our two ventures' technology developments in exchange for rights to the developed technologies.

No equity dilution resulted from the corporate alliances, but it would not be accurate to say that there was no dilution—the dilution occurred in the value of our ventures' technologies because we sold the manufacturing and marketing rights to a significant portion of our technology developments. But the dilution in our ventures' real value was far less than it would have been had we raised the same amount in venture capital financing. In the fundraising climate of the time, we might not have been able to raise that much equity financing. Forty-six million dollars of venture capital financing into ventures that are not only pre-revenue but also pre-clinical would have resulted in the transfer of well over 90 percent of our ventures' equity to the control and ownership of investors. Instead, the management team at BioHybrid Technologies and Sensor Technologies retained over 90 percent of its equity even after securing more than \$50 million of technology development financing. Equally important, the responsibility for all downstream capital requirements, which we estimated at over \$200 million, was transferred to our corporate partners.

Venture Capital Financing

In recent years, we have glamorized the venture capital industry and left many entrepreneurs with the belief that venture capital financing is the only sensible way to finance a high-growth venture. This is simply not true. Venture capital is not the only way to finance growth, and equity dilution is not the only issue entrepreneurial teams must consider as they contemplate equity financing, particularly venture capital financing. Venture capital financing always involves the ultimate purchase of venture equity, whether the transaction is a direct purchase of equity up front, or the purchase of instruments that convert to equity downstream. The net long-term result is the same: The entrepreneurial team sells a substantial portion of its equity



ownership in return for the capital it needs for development and growth.

But equity dilution is accompanied by several other important venture impacts. As the entrepreneurial team's equity stake goes down in percentage terms, its control over the strategy and tactics of the business is also reduced. Depending on the amount of financing raised and the resulting dilution, the entrepreneurial team usually drops below 50 percent ownership in the first or second round of venture capital financing. Even when the management team maintains more than 50 percent ownership in early rounds, effective control of the venture's major decisions and business strategy is often transferred to the venture investors via the conditions contained within the investment agreement. A strong entrepreneurial management team with a good business plan can maintain control of the business' strategy and operations with far less than 50 percent ownership, but it is not an easy task. Decisions such as changes to the business plan and additions or subtractions to the management team are usually controlled by the venture capital investors.

Corporate Alliance Financing

When we began BioHybrid Technologies, we faced a simple choice: raise a million dollars from a venture capitalist who would have taken 40 to 60 percent of the venture in the first round, and who would then tell us to look for corporate partners with deep pockets (because a cure for diabetes was going to take massive amounts of development funding), or look for corporate partners. We chose the latter.

Our first alliance was designed to fund the development of xenotransplantation methodologies for the treatment of diabetes and other diseases. We developed microencapsulation techniques to enable the transplantation of insulin-producing pancreatic cells from porcine and bovine sources into diabetic humans to eliminate the need for daily insulin injections. We raised approximately \$18 million from our



first corporate partner over a five-year period, retained all of our equity, and sold our corporate partner an option to acquire the rights to the developed technology for all markets worldwide. Our second technology, also diabetes-related, was an implantable glucose sensor, which, once implanted, would measure interstitial glucose in real time. We raised just under \$10 million in a second corporate alliance, retained our equity, and sold an option to acquire the developed technology for most markets worldwide. Our corporate partner was subsequently acquired by Roche, which chose not to support the development further. Thanks to careful drafting of the alliance agreement, we subsequently retained all technology rights to our development. We then raised an additional \$19 million to complete the development of our glucose monitoring technology, again with no equity dilution.

There is a major control issue with regard to venture capital financings, but there are also control issues associated with corporate alliances. All technical development decisions subsequent to closing our alliance transactions had to be made jointly with our corporate partners, and the corporate partners had the final say. Most business plan issues for our ventures became moot because the corporate partners were planning to manufacture and market our products after we completed the technical developments.

A crucial advantage of the typical corporate alliance is the fact that all subsequent capital requirements to bring the technologies to market become the responsibility of the corporate partner. We would suffer no additional dilution from the substantial amounts of financing required to manage the regulatory approval process and conduct clinical trials, to secure FDA approval, establish worldwide manufacturing capabilities, and launch marketing, sales and distribution worldwide. All of these capital requirements would be available without dilution to us, without significant fundraising efforts, and without the inevitable time lags and uncertainty associated with such fundraising.



When you consider the equity dilution of venture and other financing, it is important to think through the many rounds of capital that come after the current round is completed. In each of our three corporate alliance partnerships, all additional funding to bring the technologies through clinical trials and into the marketplace—estimated in the \$175 to \$250 million range—would be provided by the corporate partner without any equity dilution to BioHybrid/Sensor. In addition, substantial additional compensation to our ventures would come in the form of milestone and royalty payments.

A Strategic Choice

It should be noted that the decision to seek financing from corporate alliances produces a strategic business plan that is different than a plan supported by venture capital. Almost all strategic alliances involve the financing of technology development in exchange for the rights to manufacture and market the developed technology products. Many entrepreneurs want to manufacture and market their own developed products and accordingly choose to avoid aligning their venture with a corporate partner. But that almost innate entrepreneurial preference is sometimes a strategic mistake.

Many new ventures are launched to develop advanced technology solutions, and they're launched by entrepreneurial management teams that are primarily technical in experience and skill sets. These technically skilled teams then spend large amounts of time and money recruiting additional skills into their management teams—CEO management, marketing, sales, regulatory and manufacturing skills. These recruitments result in two significant outcomes: additional dilution of the team's equity, and additional venture risk. Additional dilution because these recruited team members require equity as well as salary compensation. The



additional venture risk comes from the simple fact that not all recruited management team members will work out, and because the tasks of building marketing, sales, regulatory and manufacturing functions are major undertakings to create from scratch and can be highly challenging, even to highly skilled managers.

The alternative to recruiting these team members and building and managing those functions is to partner with a major corporate player who has already built the regulatory, manufacturing, marketing, sales and distribution platforms needed, a partner who has already made the significant financial investments required and resolved the major risks inherent in building these important organizational teams and structures.

It is also important to note that venture capital and corporate alliances are not mutually exclusive choices. Many venture-backed companies still raise financing through corporate alliances, often due to the amounts of development and growth capital involved. The rights sought by corporate partners to manufacture, market and sell are often not worldwide, leaving certain markets and functions to the venture while the corporate partner pursues its own markets of primary interest. The corporate alliance arrangements may only cover some of the ventures' developing technologies and applications, leaving select markets and applications in the hands of the young venture.

The decision to seek corporate alliance financing is complicated, but there are substantial potential advantages you should consider if you require outside capital to grow. Not every growth-oriented venture is a strong candidate for corporate alliance financing, and the structure of these corporate transactions holds many pitfalls that must be carefully evaluated and negotiated. Both venture capital financings and corporate alliances have major pluses and minuses, but high-growth



ventures need to properly evaluate both before committing their venture and entrepreneurial teams to the fundraising trail.



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