ENTREPRENEURSHIP AS ECONOMICS WITH IMAGINATION

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ABSTRACT: To date, economics has failed to develop a useful theory of entrepreneurship because of its inability to break out of the static equilibrium framework and the modeling of success/failure as a 0-1 variable. Entrepreneurship research also has not achieved this task due to its preoccupation with the quest for "the successful entrepreneur" and/or *the* successful firm. This essay calls for a new vocabulary for entrepreneurship, consisting of (1) a plural notion of the entrepreneurial process as a stream of successes and failures, wherein failure management becomes the key science of entrepreneurship; (2) an effectual notion of bringing together particular entrepreneurs and particular environments through creative action; and (3) a *contingent* notion of aspirations that places imagination at the center stage of economics. Together, the new vocabulary allows us to ask new questions and develop new approaches that allow entrepreneurship to tackle the central task of imagination in economics, i.e., to create from the society we *have* to live in, the society we *want* to live in.

The classic definition of economics was given by Alfred Marshall in 1890 on the first page of his *Principles of Economics*—"a study of mankind in the ordinary business of life." To this the literary critic Northrop Frye would answer, "The fundamental job of the imagination in ordinary life . . . is to produce, out of the society we have to live in, a vision of the society we want to live in" (1964:140). Economists preach ethics unaware, but have limited their imagination in the telling of ethical stories (McCloskey, 1990: 148).

At the heart of economics is an ethical story. From Adam Smith's invisible hand (Smith, 1976) to Vilfredo Pareto's innovation on the notion of optimality (Pareto, 1980) and Amartya Sen's basic capability equality (Sen, 1998), economists do indeed preach the ethics of creative freedom and allocative justice. Yet, the charge, that *homo economicus* as a species—decked out in rational raiment and utilitarian hat—has limited imagination, is not exactly specious.

Economics has repeatedly been criticized for its (presumably) arrogant presumptions to "hardness" as opposed to other social sciences. Philosophers have criticized its utilitarianism (Rawls, 1999); psychologists have criticized its rationality (Simon, 1959; Gigerenzer, 1999); sociologists have criticized its individualism (Merton, 1957; Joas, 1996); historians have criticized its static method (Galambos, 1988); and its own rhetoricians have criticized its metaphors (McCloskey, 1990). On the one hand, one could argue that the root cause of this astonishing barrage of critical attention focused on economics is precisely due to its unarguable success in the living vocabularies and actions of recent generations of educated human beings around the world. On the other hand, however, the particular charge being investigated in this essay is the failure of economics to date to incorporate the task of imagination within its domain and therein develop a useful theory of entrepreneurship.[1]

Prologue

If the task of entrepreneurship is to move us from the world we have to live in to the world we want to live in, this immediately **BEGS THE QUESTION** of how we are to determine what kind of world we want to live in. While ethicists such as Rawls (1999) and Walzer (1983) work to establish what we ought to want, economists largely assume we already know exactly what we want. Or more precisely, we behave as though we want what economists assume we want, namely, utility maximization in the individual, profit maximization in the firm, and welfare maximization in the economy (Friedman, 1953). Thus the task of imagination is trivialized and even expelled from the received theories of neo-classical economics and the story seems to end happily with efficient markets continually clearing up imbalances to create a world in equilibrium.

The vast expanses of empirical economics, however, even if strongly steeped in neo-classical theories, tell a more muddied story of what *homo economicus* wants. For example, in a major historical synthesis of several bodies of economic literature, Galambos (1988) identifies three purposes of the modern corporation. Chronologically, the antitrust literature first identifies the monopolistic thrust toward market control. This is later balanced by discoveries of the corporation's effort to increase operational efficiency, as evidenced in subsequent bodies of scholarship on New Business History, and transaction costs. Finally, we are brought to the necessity of continual innovation as a driving purpose of the modern corporation, and the sparseness of theories of innovation in the discipline.

Developments in theories of innovation have, of course, continued since the Galambos synthesis. But as recently as 1995, Richard Nelson, who along with Sidney Winter brought to economics the evolutionary theory of economic change, had to content himself with the dissatisfying statement: "It is clear that, *somehow*,[2] in the now advanced industrial nations, there have been mechanisms that have made the coevolution of technology, industrial organization, and institutions more broadly, move in directions that have led to sustained economic progress" (Nelson, 1995).

Obversely, an inchoate but growing gaggle of researchers in entrepreneurship has continued to sing the paeans of the entrepreneur/intrapreneur/new venture/small business in achieving (the still unfortunately externally imposed telos of) economic progress through innovation. Prominent among these is the alertness theory of entrepreneurship developed by Israel Kirzner, and based on Austrian economics. In Kirzner's view, entrepreneurial alertness takes center stage in the market process to spot and correct disequilibria or discover and exploit hitherto unperceived opportunities, both cross-sectionally between different parts of today's market and intertemporally between parts of today's market and tomorrow's market (Kirzner, 1985). All the same, any claim that this theory might help us escape the limited imagination of neo-classical economics is effectively disputed by two critiques which demonstrate the paralyzing stranglehold of the (teleological) equilibrium framework on this theory (Schulz, 1975; Buchanan and Vanberg, 1991).

In their detailed exposition, Buchanan and Vanberg are particularly scathing about the intertemporal aspects of Kirzner's theory. Thereafter they go on to develop their own vision of the market as a *creative* process, as an alternative both to Kirzner's *discovery* process and the earlier more ossified *allocative* process. The vision calls for a non-teleological theory in which no ultimate purpose is imposed on the phenomena by economists studying them. This essay uses this vision as a springboard to develop the conceptual foundations of a theory of entrepreneurship as economics with imagination, in which a detailed vision of the society we want to live in, or the economy we want to create, is not given *a priori*. Instead, such a theory would explicitly seek to allow *homo economicus* to shape and create a changing plurality of purposes and goals in a contingent fashion, translating moral and aesthetic "oughts" into mundane economic "cans" through creative entrepreneurial action.

Method

Eschewing some entrenched traditions of narrative in economics, this essay develops its ideas through a more philosophically pragmatic approach. Since the original charge it addresses, namely that of economics being limited in imagination, is a critique of economists' rhetoric based on a tradition of literary criticism, it is not inappropriate that the charge be met using pragmatic-linguistic rather than analytical/argumentation tools.

The key to this method is the idea that you do not create a new theory or a new world by wrestling the old one to the ground. Rather, the old world-theory and its questions wither away into indifference over time in the face of new questions and phenomena uncovered through a new vocabulary that strives to express world experiences that would have been impossible within the old. In Rorty's words:

> Europe did not "decide" to accept the idiom of Romantic poetry, socialist politics, or of Galilean mechanics. That sort of shift was no more an act of will than it was a result of argument. Rather, Europe

> gradually lost the habit of using certain words and gradually acquired the habit of using others. . . . Interesting philosophy is rarely an examination of the pros and cons of a thesis. Usually it is, implicitly or explicitly, a contest between an entrenched vocabulary which has become a nuisance and a half-formed new vocabulary which vaguely promises great things (Rorty, 1989: 6).

In the spirit of such a pragmatic method, this essay introduces new meanings and uses for three sets of concepts in entrepreneurial economics.

- First, the conceptualization of success/failure as a zero-one variable is replaced with an intrinsically plural notion of the entrepreneurial process as a continual stream of successes and failures. Entrepreneurship then becomes a journey of learning to outlive failures and cumulate successes over time.

- Second, the notion of the entrepreneur is explicitly disconnected from the notion of the firm. This enables us to completely dissolve the concept of "the successful entrepreneur", while allowing us to continue to talk about the successes and failures of firms in a meaningful way.

- Third, the contingent nature of aspirations is allowed to break through the economic inevitability of the neo-classical surface so that the seminal stirrings of a non-teleological theory can begin to be nurtured.

Finally, a real life entrepreneurial story is presented using both the standard vocabulary and the new vocabulary outlined here.

Success/Failure is NOT *a 0-1 Variable*

One of the more familiar stories of entrepreneurship involves the "plunge" decision. The story usually goes as follows: A young man with a promising future in corporate America decides to give up his lucrative job to start a new venture.[3] Friends and relatives, and even colleagues and employer ask him to rethink his decision in terms of his opportunity costs. One familiar and happy ending to the story is that our hero flamboyantly takes the plunge anyway and goes on to build a highly successful company. And so the myth is built and grows. Entrepreneurs are risk-loving, they believe steadfastly in their indomitable vision of success, fly toward the sun uncaring, and, unlike Icarus, manage to survive and even prosper.

Reality, however, turns out a more *adult* version of the same myth—richer in texture and subtler in appeal. When entrepreneurs are asked in more detail about their experience of the plunge decision, a variety of answers emerge on a continuum from the Icarus-type myth cited above to months of sleepless nights (Silver, 1985). The average story goes more like this: The hero tells his family and well-wishers, "I have always dreamed of being my own boss.[4] If I do not do this now, when will I ever do it? There are indeed opportunity costs to trying. But there are opportunity costs to not trying, too. If I take the plunge now, I may or may not succeed. If I do not take it now, I am certain to fail my dream." As Blomkvist says—people do not risk what they value most (Blomkvist, 1987). And so the real story is about a more or less ordered system of values, where the entrepreneur (or more generally, the "risk taker") trades off lower priority values for higher priority ones. The story of the plunge decision now has a different ending. It is not that the entrepreneur loves risk, it is just that he loves independence (or some other value) more than security. In more economic terms, it is not that he disregards the opportunity costs of failure, and therefore behaves irrationally, but that he considers the opportunity costs of not trying and finds them too dear to afford.

Furthermore, such trade-offs between values are not decided and settled once and for all at the beginning of the entrepreneurial adventure. Entrepreneurs routinely revisit them on the journey. When a group of entrepreneurs who had built companies **RANGING IN SIZE FROM $200 MILLION TO $6.5 BILLION** were asked to share their experiences about successes and failures, the most common response triggered was the bromide, "Failure is not an option" (Sarasvathy, 1998). The immediate interpretation of this statement could, of course, be that they were in denial and that they refused to take the possibility of failure into account. Further probing, however, yielded the notion that they refused to subscribe to the conception of success/failure as a zero-one variable. In other words, success does not equal "not failing," and vice versa. Instead the picture that emerges through these conversations is that the entrepreneurial experience is composed of a temporal stream of varying degrees of successes and failures. Entrepreneurship therefore becomes the art of learning to outlive failures and cumulate successes over time. When certain critical thresholds are crossed, the world recognizes the net balance as "success," and a new myth—that of "the successful entrepreneur"—is born.

On the face of it, modeling failure as the undesirable half of a 0-1 variable has led economists to develop useful institutions of failure avoidance, based on a calculus of risk aversion. Modern portfolio theory in financial economics is just one instance of this crusade against risk, or more precisely, a certain kind of variance. Yet, ironically, every company on the stock market has been started by one or more individuals who have proceeded in a completely undiversified fashion, and continued in that fashion over several ups and downs in their personal net-worths.[5] Economics, with its current limited imagination, cannot explain this curious anomaly. Nor can it avoid responsibility for the even more serious indictment of William James as to the "moral flabbiness born of the exclusive worship of the bitch-goddess SUCCESS" and the "national disease" that such worship, "together with the squalid cash interpretation put upon the word success," creates (Katz, 1968).

Failures are important, even necessary. Even with the current success-centered perspective on economic phenomena, failures are crucial, under two separate sets of assumptions about the underlying distribution of the phenomena. First, following Kenneth Arrow, one might believe that the underlying distribution is generated by a stochastic process (Sarasvathy, 2000). In other words, entrepreneurs start companies.[6] Very few succeed and most fail. Cumulative learning is not possible, since there is nothing really there to learn. And so we come to the conclusion that lots and lots of people should be encouraged to try (even though we believe going in that most of them will fail) so the economy can continue to have its required quota of successes to keep it healthy and growing.

Second, we could assume that there are definite regularities in the phenomena that can be learned and used to our advantage in creating and sustaining enterprises. Failures become even more important under this set of assumptions because now entrepreneurship can be examined through either the metaphor of "design," or that of the scientific method. Both are based on learning through failures. As Petroski demonstrates through his compendium of design cases from ancient Greeks to today, "[T]he process of design, from the conceptualization to the realization of the artifact, is essentially a timeless, placeless, and even thingless human activity that succeeds only insofar as it anticipates failure" (Petroski, 1994: 120). Popperian science, with its emphasis on falsifiability of hypotheses, institutionalizes the idea of learning through failures. While most popular entrepreneurship gurus tacitly assume the design metaphor, business schools and academic researchers tend to proceed through Popperian science, both in their research and pedagogy. Learning through hypothesis testing is used not only as a method for their research, it is also a prescription in the classroom. Entrepreneurship classes urge potential entrepreneurs to do extensive market research and trial marketing to divine the demand function for their products and services, and then to design competitive strategies to capture market share and increase **ROI**. The watchword in all this is "The Business Plan."6

But both assumptions about the underlying distribution of the phenomena prevent us from constructing a non-teleological theory. Both model success/failure as a 0-1 variable. Also, both impose universal exogenous purposes on the entrepreneur, such as to maximize ROI or market share. But this is exactly what traps *homo economicus* in the world as it exists, and prevents her from moving to the more desirable world that is not quite yet made, that is as James would put it, "in the making."

To bring back imagination into economics we require the notion of a plurality of successes and failures. Multiplicities of failures and successes presuppose multiplicities of purposes, for success or failure is meaningless without the notion of an attendant purpose. Unless we assume that our purposes are granted to us through some external moral authority, we have to recognize that it is through a multiplicity of failures and successes that we build, rearrange, and reconstruct our lading lists of wants, desires, aspirations, and even enduring values. Its ongoing successes and failures are where the rubber of the vehicle of enterprise meets the road of society's "imagination," and determines new and often uncharted paths to steer through. It is as the poet says, "I learn by going where I have to go" (Gensler, 1987: 279).

From a pragmatic standpoint, recognizing that the entrepreneurial experience consists of a stream of successes and failures allows us to develop both new research and new pedagogy in entrepreneurship. For example, we can now start asking questions such as: Are all failures and successes the same? If some types of failures are desirable and even necessary, while others are harmful and avoidable, how can we learn to recognize differences and develop differentiated strategies? Perhaps this would lead us, both as economists and as entrepreneurs, to be bolder in our hypotheses and more conservative in expenditures on testing them. Similarly, if we start modeling risk as a trade-off between two or more values, instead of variations in expected return, perhaps we could explain the entrepreneur's undiversified investment in his or her own enterprise, and also prescribe when society is justified in doing the same.

In short, plurality of failures and successes in the entrepreneurial experience brings us to the conclusion that failure management ought to be an important science of entrepreneurship. Furthermore, such a notion of success/failure would be necessary to create an economics with imagination, an economics in which the society we want to live in becomes endogenous to the economic process and is not externally imposed on it a priori. To aid in that endeavor, the next step is to examine the myth of the "successful entrepreneur" and the current confusion in economics of treating the "entrepreneur" and "firm" as one and the same thing.

The entrepreneur ≠ The firm

One of the most disconcerting aspects of a novice's entrepreneurial experience consists in her having to learn to separate her individual identity from that of her firm. Especially in the initial stages, she tends to experience her firm as a part of herself. It is not unusual for startup entrepreneurs, irrespective of gender, to describe their enterprises as their "baby." For that matter, it is not unusual for entrepreneurs continuing to manage their enterprises after they have grown into very large businesses, to talk about their enterprises in a similar vein.[7]

Experientially, the key to separating the notion of "entrepreneur" from the notion of "the firm" consists in the dawning realization that "the firm" has to earn its right to exist on a daily basis. Even more interestingly, it has a right to cease to exist, more or less at the will of the entrepreneur. It is as though the basic rights of the entrepreneur as a human being are inverted in her role as "entrepreneur". This is a particularly difficult realization for an entrepreneur who faces cash flow and other problems and is eventually faced with issues of ignominious exit, such as bankruptcy; or if the cash flow problems are due to unexpectedly rapid growth, is faced with issues of selling part or all of her company.

This identity crisis is directly connected with the foregoing discussion of the notions of success and failure. The modern concept of "incorporation," with its associated aspects of "perpetual life," "diversified ownership," and "limited liability," was created precisely to free individual entrepreneurs to take on the uncertainties of an unpredictable future, without standing to lose their entire personal net worth. In *Dartmouth College v. Woodward (1819)* Chief Justice Marshall wrote that the corporation is "an artificial being, invisible, intangible and existing only in contemplation of the law." The concept of "limited liability" in particular is an express recognition of the fact that failures are important to the economy, and that the opportunity costs of not trying are likely to stunt its growth. But for the novice entrepreneur, especially in a society that worships SUCCESS, the firm he creates can become tangibly emotional, and very much entangled in his own self esteem.

While the semantic confusion of "entrepreneur" and "firm" might perhaps be understandable in the case of the individual entrepreneur, the difficulty of economics to separate the two requires a more convoluted explanation. In his 1996 edition of the classic "Economic Theory in Retrospect," Mark Blaug devotes six pages out of 704 to "The history of the concept of entrepreneurship" (Blaug, 1996). The following excerpts typify his summary:

> So long as economic analysis is pre-occupied with the nature of static equilibrium under conditions of perfect competition, there is simply no room either for a theory of entrepreneurship or a theory of profit as the residual income claims of persons who assume the risks associated with uncertainty (p. 444).
>
> This is the more remarkable in that this virtual consensus about the unimportance of entrepreneurship has been seriously questioned on at least two notable occasions in the twentieth century (p. 444). (First, by Frank Knight, and second, by Joseph Schumpeter.)
>
> [H]owever, mainstream economic theory has continued to neglect Schumpeter's writings on entrepreneurship as it continues to neglect Knight's theory of profits because neither fits in with static equilibrium analysis (p. 446).[8]

Therefore economics equates the entrepreneur with "the firm," an entity sprung fully formed from the entrepreneurial womb, as it were.

As Venkataraman has observed, the entrepreneurship literature, on the other hand, is pre-occupied with the success or failure of individual entrepreneurs and firms (Venkataraman, 1997), including elucidating the differences between the "successful entrepreneur" and the "failed entrepreneur." The extant literature is astonishingly divided on estimates of the success rates of startup firms. The most widely known and used number is the one calculated by the National Venture Capital Association which ranges between one or two successes out of every ten firms financed by a venture capitalist. But when we take into account the fact that VCs finance **LESS THAN .001 PERCENT, OR**

LESS THAN ONE IN ONE THOUSAND of all startups, it becomes difficult to extrapolate their estimate to the larger population. At the other extreme, Kirchhoff estimates the startup failure rate, with failure defined as involuntary exit with money owed to debtors, at around 11% (Kirchhoff, 1997). Even if we believe the failure rate lies somewhere between 11% and 80%, with our confidence leaning more toward the latter figure, we cannot assume that the *entrepreneurs* who started those failed ventures have failed. One does not walk down the street, even in Silicon Valley, where all experts agree the species "entrepreneur" abounds, and meet *failed* entrepreneurs.[9] Nor is it easy, on that same street, to meet a "successful entrepreneur" who has not failed once or twice, either before his first acclaimed success or after it.

In fact, evidence suggests that the so-called "successful entrepreneur" is an elusive, many-splendored beast. Entrepreneurs range all over the risk preference spectrum (Palich and Bagby, 1992); they make it to both lists—the ten easiest bosses to work for, and the ten most difficult bosses to work for; bleeding heart liberals and tough libertarians and shades in between all build thriving firms; firms succeed by being bold and brash and churning in change and also by being narrowly focused and conservative and extremely understated in their strategies; both formal strategic planning and lack of it seem to have worked (Schwenk and Shrader, 1993). Current theories have a tough time explaining some of these phenomena and, particularly, in suggesting courses of action for particular individuals in creating particular economic artifacts.

Furthermore, the concept of "successful entrepreneur" versus "failed entrepreneur" has led to serious difficulties in understanding the entrepreneurial experience. Positivist researchers have long sought a natural experiment consisting of matched groups of the two (supposed) varieties of the species so they could come up with a reasonably definitive set of success factors. But this **BEGS THE QUESTION** as to why a theory of entrepreneurship has to explain the "successful entrepreneur" as opposed to a "failed entrepreneur" or even why it must consist of a set of "success" factors. A theory of accounting is not required to explain successful versus failed accountants; nor is a theory of music about successful versus unsuccessful composers. Even theories of management are not built by comparing successful managers to unsuccessful ones, nor do they elucidate the principles of "successful" management.

It is the contention of this essay that "entrepreneurs" do not fail. Only the firms they endeavor to create may fail. And even they may not fail in any ultimate sense if they serve as a means for the economy to discover what works and what does not work in a world of changing human imagination and aspirations. More precisely, the terms "successful entrepreneur" and "failed entrepreneur" are pragmatically bankrupt in their meaning. Expunging the term "successful entrepreneur" (and its antonym) from our vocabulary has profound implications for practice, pedagogy, and research. It suggests we need to give up ideas such as the successful personality, or clearly superior characteristics of the successful firm or organization. Rather, we may need to learn to deal with a rain forest of individuals and firms and markets and societies, intermeshed and woven together with completely coherent yet vastly diverse local patterns that add up to a complex, inter-dependent ecology of human artifacts.

We need to move away from the vision of the "market" as a monolithic construct that rides roughshod over vast farmlands of homogenous commodities, relentlessly separating the wheat from the chaff, and start researching "markets" as groups of individuals and communities developing a variety of gardens and parks based on their particular tastes in landscaping and architecture. Only then could we begin to explain why people of all types seem to build successful companies and other economic artifacts. The focus in our journals and classrooms, for example, would shift from how to build a successful firm or how to become a successful entrepreneur to "What types of ideas and opportunities should YOU pursue?" and "Given who you are, what you know, and whom you know, what types of economic and/or social artifacts can you, would you want to, and should you create?" The old adage about invention captures this shift rather pithily: *Both the optimist and the pessimist contribute to successful inventions. The optimist invents the airplane; the pessimist, the parachute.*

Without the confusion of the "successful entrepreneur" and armed with the notion of a plurality of successes and failures, the ground is now prepared and the time is ripe for the contingent nature of aspirations to break through the neo-classical crust.

The Contingency of Aspirations

Something happened in the eighteenth century. As the historian Thomas McCraw points out,

> "In Europe during the thousand years before 1700, per capita income grew at the minuscule rate of about 0.11 percent per year, or just over a tenth of a percent. There is no substantial reason to think that the rate was much more or less than that in most other parts of the world. . . . But between 1820 and 1990, a period of 170 years, it multiplied by a factor of about 10 in Great Britain, 15 in Germany, 18 in the United States, and 25 in Japan. The capitalist era, especially the period since 1820, has been unique in human history, a time of spectacular economic growth" (McCraw, 1997: p. 1).

While historians and others may debate the actual causes of this miracle, this essay is only concerned with the role of one entrepreneur in it. In the middle of the eighteenth century, a potter named Josiah Wedgwood created a brand (and a company[10]) that endures till today. Since Josiah kept detailed diaries, historians have been able to piece together his story in considerable detail and authenticity (Koehn, 1997: 17–48).

Josiah's story appears innocuous to begin with. Pottery had been a comfortably profitable business for centuries before Josiah came along. He did not create any revolutionary new technologies, except to adapt the inventions of others, and perhaps to continually improve upon them. Yet, inexplicably, he was able to charge up to four times as much as his competitors, especially for his line of *useful* ware.

Josiah Wedgwood, with his philosopher partner, Thomas Bentley, had figured out that people tend to put their money where their aspirations are. In other words people are more likely to spend money on who they want to be than on who they are. No self-respecting eighteenth-century Briton would pay more than two pence for a good table plate. But a top-quality *Wedgwood Queensware* dinner plate was another matter altogether – it was not too dear at eight pence. Wedgwood pottery came to embody the idea of "social mobility," the great utopian idea that one is not condemned to die in the same station one was born into.

And this was not a serendipitous event. Josiah had to engage in continuous and protracted endeavor to create this "image." Not only did he practically invent the very concept of "marketing" and a host of other demand-side innovations, but he also worked to promote canals and other public works, and introduced that most resented of factory disciplines, the tyranny of the time clock. But perhaps his endeavor was more about making the human beings who could make the pots and use them, than about making the pots themselves. Nancy Koehn gives an example of it from Josiah's writings:

> The task, he wrote Bentley, was to make artists of *mere men*. It made no sense to rely on the local labor market because "few hands can be got to paint the flowers in the style we want them. I may add, nor any other work we do. *We must make them*. There is no other way" (Koehn, 1997: 44).

Schumpeter echoed this idea of the artifact shaping the species that created it when he observed, "It was not enough to produce satisfactory soap, it was also necessary to induce people to wash" (Schumpeter, 1939: 243).

Economists generally think of supply-side innovations, such as new technologies, as the key to economic success. They also assume that demand and, particularly, its underlying schedule of preferences is "out there," to be discovered and exploited through cheaper, faster, better products and services that emerge (automatically, as it were) through new technological advances. As Josiah figured out in the eighteenth century, and as media and advertisers, and most entrepreneurs know today, human aspirations are contingent upon a host of factors, and can therefore, within limits, be shaped and controlled for economic benefit.

The shaping of human aspirations through the creation of economic artifacts such as products and markets is an essential act of entrepreneurship. But this act inextricably involves the entrepreneur in *all* aspects of the lives of large groups of human beings, not only in their "economic" lives. In fact, human beings create values in every domain of action and reflection—be it poetry or the arts or religion or cooking or science or sports—and these values influence their aspirations in intricate and complex ways. It becomes, then, the task of entrepreneurship, using economic means, to match up the values created through human imagination with the values cherished in human aspirations. This picture of the entrepreneur is not that of a rich, bloated capitalist, who manipulates the world to his own aspirations. Instead the entrepreneur painted in this essay starts out as any other human being, but *over time,* creates enormous wealth and power for himself and those with him on the journey, through a process combining the discovery, *creation,* and fulfillment of human aspirations.

The startup entrepreneur accumulates wealth and power only to the extent that her own aspirations are in alignment with those of her stakeholders, and to the extent that her imagination is fertile enough to sculpt a vision of the world they would all want to live in. But depending upon how much wealth and power she *does* accumulate, she can then wield those powers to influence the "world in the making" to be built in her own image. Or not. For example, once upon a time, a potter made his fortune through the dreams of millions who wanted to break out of the shackles of their birth. And the potter's fortune in turn made possible a new world in the making, ushered in by the *Origin of Species*. Charles Darwin was Josiah Wedgwood's grandson, and the Wedgwood fortune helped underwrite the voyage of *The Beagle*.

It is here that the pragmatic implications of a theory of entrepreneurship based on contingent aspirations become important. Business schools train entrepreneurs today to meet externally imposed measures of performance (market share and ROI targets) by fulfilling exogenously given demand (over which they have no control and for which they have no responsibility) through new and more "efficient" technologies. Potential entrepreneurs are not made aware of their task of bringing "imagination" to the economy, in the sense of Northrop Frye, in the sense of crafting a vision of the society we want to live in, from the society we have to live in (Frye, 1964). Yet, as history shows us, this is what they end up doing, willy nilly.

In light of this, it is (or should be) of serious concern in our research and pedagogy that we do not confront them with the possible consequences of the choices they will make on their journey of economic imagination. We do not ask them to reflect upon the question, for example, as to why each of the four countries that achieved the highest economic growth rates in the past three centuries could not prevent its embarrassing historical underbelly, of which, as McCraw puts it, "it is ashamed, or ought to be: Britain of its cruel treatment of subjugated peoples in parts of its empire; Japan of atrocities against East and South Asian peoples before and during World War II; the United States of whites' enslavement of African-Americans; Germany of the Holocaust." The issue is not that capitalism or economic growth caused such tragedies, or that other societies do not have such underbellies, but that capitalism "certainly did not prevent them" (McCraw, 1997: p. 7). Could it possibly be that imbuing economics with "imagination" might make a difference in this regard?

To examine that question very briefly, let us consider two published descriptions of an actual company, AES Corporation.

Two Tales of a Company

AES Corporation is a rather strange company.

Here is its standard story from Hoover's Company Profile Database:

> AES does not stand for "an excellent start," but it could. By focusing on the simple mission of providing electricity to customers around the world, the relatively young Arlington, Virginia-based company has rapidly become a leading global independent power producer. The company has interests in about 125 power plants that generate 44,000 MW on five continents. AES, the #1 US power plant developer, owns and operates its facilities and sells its power wholesale, primarily to electric utilities and regional electric companies. The sun never sets on AES. The globe-trotter serves areas as diverse as Bangladesh and Northern Ireland. AES is focused on Brazil, where it operates about 50 plants. The 18 plants that comprise its US operations serve the East Coast and Midwest as well as California, Hawaii, and Texas. AES also distributes electricity to 15 million customers through 17 businesses in Latin America, Eastern Europe, India, and the US. AES is continuing its worldwide building binge, as 11 plants with 7,000 MW of capacity are under construction. The power generator also is expanding into broadband in Brazil through subsidiary Eletronet, which will use the transmission grid to install a telecommunications network. Founders Roger Sant and Dennis Bakke own 10% and 8% of the company, respectively. HISTORY: Electric power production in the US was once the exclusive province of utility monopolies set up by the Public Utility Holding Company Act of 1935. But the oil crisis in the 1970s shook that foundation and Congress enacted the Public Utilities Regulation Policies Act (PURPA) in 1978. PURPA created the legal basis for small power firms to enter the electric generation markets. One such firm is Applied Energy Services (AES), founded in 1981 by Roger Sant and Dennis Bakke, two former members of President Nixon's Federal Energy Administration. The two saw that an independent power producer (IPP) could make money by generating cheap power in large volumes to sell to large power consumers and utilities.

And so it goes.

But, as mentioned earlier, AES is a strange company. There is another story to it. Several Harvard and other business cases have been written about it because of this second story. AES does not have a human resources department. Because of the company's stated commitment to upholding its four "Shared Values" even at the expense of the bottom line, SEC deemed the stock higher in risk and required a special warning to be issued on its prospectus. Also, because every employee has access to all information in the company, SEC has also declared *all* AES employees "insiders."

The following is an extract from an HBS case:

> According to Bob Price, an AES Thames plant superintendent, at AES, employee initiative was not just rewarded; it was expected. At the Thames plant, an employee needing a tool was expected to go to the local store and buy it using a corporate credit card. No permission was required. No spending limits were set. When a $30,000 hydraulic pump broke, the employee who discovered the problem called suppliers and authorized the repair. He notified his supervisor only after the fact. Employees also authorized their own overtime. Workers' authority even extended to the firing of subcontractors for safety violations. Visitors at the Thames plant were often told about the employee who found a subcontractor seriously violating safety precautions. The employee did not report the infractions to his supervisor or ask permission. He simply escorted the subcontractor to the plant gates and dismissed him. His manager bragged about the behavior (Mavrinac, 1994).

When asked, "Did you set out to make AES a 'poster company' for empowerment?" one of the founder entrepreneurs, Bakke, replied,

> We knew that we wanted to create a very different kind of company, that's for sure. I don't think we used the word *empowerment*—I'm not sure it was even around in 1981. Our main goal at the beginning was to build a company that we ourselves would want to work in. The actual type of business wasn't really important, to tell you the truth. It could have been an energy conservation company, it could have been steel. It ended up being an electricity company. We just wanted to create a company that embodied the four principles that we felt mattered in any kind of community, be it a business, church, village, or whatever: fairness, integrity, social responsibility, and fun. That last one—fun—is very important. Some companies just tag it on to the end of their mission statement. But for us, fun is really central. We never set out to be the most efficient or most powerful or richest company in the world—only the most fun. And I think we're getting there (Wetlaufer, 1999, p. 112).

When asked about his experiences of successes and failures, Bakke mentions without hesitation, "We fail all the time." And goes on to specifics about the "Shady Point incident," when nine members of AES's water treatment team lied to the EPA. When he and Sant issued a press release to both internal and external stakeholders breaking the news, the stock lost almost 40% of its value in one day. AES lived through many such failures, as well as through the cumulated successes catalogued in the standard story.

The standard story appears to have carefully expunged any indication of "imagination" at work at AES. It is all about the "economic inevitability" of growth and prosperity when a company proceeds "by focusing on the simple mission of providing electricity to customers around the world." The second story, however, is all about the "vision of the society we *want* to live in." Everything about it is tentative and unformed and experimental and contingent. If we erased some key names, the stories would appear totally disconnected. And yet they are the same story. They describe the same economic artifact. How does one get to the standard story from the other one? The interesting issue here is not which story is more important, but the consequences of the fact that they are the same story. The consequences specify the existence of a logic that spans the two stories. The tracing out of that logic has to form the core of an economics with imagination.

Several decades ago Dewey wrote,

> [A]s my study and thinking progressed, I became more and more troubled by the intellectual scandal that seemed to me involved in the current (and traditional) dualism in logical standpoint and method between something called "science" on the one hand and something called "morals" on the other. I have long felt that the construction of a logic, that is, a method of effective inquiry, which would apply without abrupt breach of continuity to the fields designated by both of these words, is at once our needed theoretical solvent and the supply of our greatest practical want (Dewey, 1930: 19).

The pragmatic changes in research and pedagogy that this essay calls for are meant to echo the very sentiment Dewey expresses, substituting the word "economics" for "science," and "entrepreneurship" for "morals" in the excerpt quoted above.

Indeed, the creation of an economics with imagination is at once our needed theoretical solvent and the supply of our greatest practical want. And it is to be hoped that such a theory would lead our experts, in McCloskey's words, "to less pretended omniscience and more real wisdom, wisdom to tell the stories testing metaphors and to frame the metaphors that test the stories" (McCloskey, 1990: p. 162).

Epilogue

At its heart, entrepreneurship is about the future. Not the future that has already happened and is therefore predictable (such as Drucker's exposition on demographics,[11] or the developing speed of the microchip according to Moore's law), but the future that is barely imagined today and can only be known in the creation of it tomorrow. Entrepreneurship is what happens in garages even as some economists[12] hail the extinction of the species "entrepreneur." It is also what creates the "information economy" and "e-business," belying very reasonable expert estimates of a total market size of about two thousand computers for the whole of the twentieth century. This is not to say that entrepreneurs are prescient and economists are not. Quite the contrary, in fact. Entrepreneurs are likely to be less prescient than economists, because those who believe the world is "in the making" are unlikely to spend time in analyzing the future or trying to predict it. Instead, the point here is that an economics without entrepreneurship will remain an economics largely incapable of imagination. For it is the task of entrepreneurship to partially discover and fully forge and implement through economic means the vision of a future composed of the diverse aspirations of millions of people to create the society we want to live in from the society we have to live in.

Notes

1. It is important to note that the charge of limited imagination is levied against economics and not against economists. One has only to read the Richard T. Ely lectures in the *American Economic Review* to refute the latter charge.

2. Emphasis added.

3. Although the term “entrepreneur” is mostly used in the singular in this essay, the arguments can equally well be extended to the entrepreneurial “team.”

4. There are, of course, countless variants of this.

5. In a recent interview, Ted Turner, the entrepreneur who created CNN, astonished his interviewer (and several of CNN’s own financial reporters) by saying he believed in keeping all his money (except for trivial amounts that he may not even know about) in CNN/Time Warner.

6. It is not very clear why, but the implicit consensus is that they do so mostly for the very squalid cash interpretation put upon the word success that James deplores.

7. This is even more so with entrepreneurs who build substantial companies, but refuse to take them public.

8. (And finally . . .) Unfortunately, the new Austrian theory of entrepreneurship (a la Kirzner) reduces entrepreneurship to any kind of arbitrage and in so doing wipes out most of the crucial questions that have been traditionally posed about entrepreneurship (p. 447).

9. Even in a book such as “When Smart People Fail,” which documents the lives of people who have experienced substantial failures, the stories end with their coming out of it to build new lives. Of course, there will no doubt be cases of entrepreneurs undergoing severe psychological trauma and/or committing suicide after one of their enterprises fails. But whether that makes the concept of a “failed entrepreneur” or that of a “successful” one any more useful in a pragmatic sense is extremely doubtful.

10. In 1986, Waterford Crystal acquired Josiah Wedgwood & Sons, but the Wedgwood group survives within Waterford Wedgwood, with about 5,500 people working for it in 1995.

11. Drucker, P. F. (1997)

12. A la J. K. Galbraith

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