

Knowledge management and the strategies of global business education:

From knowledge to wisdom

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Abstract

In this chapter we emphasize the role of knowledge and social infrastructure in the development of nations. We start with the critique of the Lisbon strategy: it concentrates on wrong goals and relies on declarations and exhortations rather than doing. Then we discuss some World Bank studies implying that prosperity of nations is closely correlated with reliance on human and social capital. Finally, we discuss the notion and taxonomy of knowledge, the emergence of strategic wisdom project, measurement of knowledge via added value and the institution of entrepreneurial university as main strategic concepts for achieving competitive success in the global economy.

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Introduction

Knowledge and education are becoming major competitive prerequisites for economic growth. The examples of "Indo-China" (China-India economic alliance), but also of USA, Japan, Taiwan and Singapore are more than compelling. So are the

successful efforts of “small states of Europe”, especially Denmark, Finland, Ireland, Iceland, Luxembourg, etc., but also Slovenia and Estonia.

But Europe as a whole, that is EU, is continuing limping behind and not participating fully in the new global economy, but increasingly wrapping itself up within itself, concentrating on its endless political fights and powershifts, or “finding its identity”.

One of the main symptoms of malaise was the ill-fated *Lisbon strategy*. This was a typical example of how not to proceed in the global era. LS was formulated by EU bureaucrats without engaging sufficiently the business and entrepreneurial spheres, and not at all the educational sphere. One cannot pull up through a pure political will, without engaging “the doers”.¹

LS was not really a strategy, but a huge and very expensive pile of papers and bureaucratic exhortations. Here we can list only a few of its remarkable shortcomings and failures:

1. Its primary goal (“to catch up and surpass the USA”) is ill-conceived. The US is not to be competed with, but to be complemented and expanded in mutual cooperation and alliance Europe-US. The undeclared strategy of “Indo-China” is much more powerful and represents much bigger threat to European economic well-being. The misreading of global trends is remarkable.
2. Strategy is *not* about what you say, but about what you do. A laundry list of printed wishes, proclamations and declarations is not a strategy. One cannot let bureaucrats to formulate “visions” to be carried out by business. Business must formulate visions to be supported by politicians. The shortcomings in strategic thinking are surprising.
3. EU is primarily a political agglomeration and therefore is destined to suffer from political ups and downs of unstable party systems. To become competitive, EU would have to abandon its bureaucratic model and transform itself into a triune model of < Education-Business-Public Interest >.

¹ The EU conference *In Search of new Europe*, May 4-5, 2006 in Prague, has addressed the issues of the triune <Education-Business-Public Interest> cooperation and competitive synergy.

4. The notion of knowledge was misunderstood in LS: it got confused with information. Information is not knowledge. One cannot build a competitive advantage on information which has become a globally accessible commodity.
5. Because of this confusion, the educational system did not transform itself and instead of knowledge it strengthened its role in transferring more information. More and more graduates are therefore more and more informed, less and less knowledgeable, and certainly not wise.

It is the last two points we shall address in this short contribution. The other points could be more important at the moment, but the last two are more deeply rooted and less easily fixed or repaired.

Also, business education is steadily going global and it will never become local, regional or provincial again. Not even in Europe. Management systems have globally witnessed a cumulative progression from *data* processing, through *information* technology, to the current *knowledge* management. *The next step is wisdom.*²

Corporations can be *informed*, they can be *knowledgeable*, but in the global era they must increasingly become *wise*. *Wisdom of enterprise*, its definition, taxonomy, achievement and use are the purposes of the “wisdom project.”

Although the term *wisdom* is ancient and laden with substantial and significant philosophical meanings, our aim here is not scientific or philosophical, but *pragmatic*, *practical* and *useful*. Wisdom should become – like knowledge and information – a manageable resource for the *Corporate spine* of **4Es**: Efficiency, Effectiveness, Explicability and Ethics.

That is the strategic “spine” that should also dominate EU business education. Clearly, Efficiency is about doing things right, Effectiveness about doing the right things, Explicability about being able to understand and explain one’s action, and Ethics about

² “Wisdom systems” is a new working term representing a new concept, the next stage of evolution after KM (Knowledge Management), the term coined in 1987. [see Zeleny, M., “Management Support Systems: Towards Integrated Knowledge Management,” *Human Systems Management*, 7(1987)1, pp. 59-70.]

assuming responsibility for one's action. In the end, it is all about deciding, doing, and acting. It does not matter what we say, the only thing that matters is what we do.

Knowledge and the Prosperity of Nations

It can be demonstrated that the prosperous and richest nations are those well equipped in knowledge and human capital, while the poorest countries have and rely only on their natural resources and labor. Man-made, built capital is quite useless without knowledge. Bags of money cannot become productive capital without knowledge. Countries and cultures can be resource rich, even information rich, and yet remain knowledge poor.

Knowledge, defined as the ability to coordinate one's actions, alone and with others, effectively and purposefully, is embedded within and activated by human, social and cultural institutions.

Learning to coordinate one's actions, i.e., producing, maintaining and sustaining human capital, can only take place within a requisite social infrastructure: cultural and educational institutions, family-based kinship systems and shared experiences of history, habits, values, beliefs and aspirations.

A functioning democracy is based on respect and free-market behavior is based on trust. This is why democracy and markets are to a large extent [often hard] learned behaviors, brought forth by strong cultures and social infrastructures. Without the learned and deeply habituated respect and trust, both democracy and markets become merely gaudy, often cruel, caricatures of themselves.

Only socially and culturally strong nations, rich in human capital, family values, respect and trust, can ever become prosperous – regardless of their natural, physical or financial endowments. Only the learning nations, evolving their human and social capital continually and reliably, can ever taste truly sustainable prosperity.

A wealthy nation, like a wealthy farmer, must be able to continue increasing its stock of capital. Such accumulation of the capital stock enlarges the set of alternatives and opportunities for subsequent generations, thus making current wealth sustainable.

Increased wealth also helps to generate higher income, although higher income can also be temporarily created through decreasing one's wealth and reducing the capital.

Only poor countries, like poor individuals, live mostly from their income while only maintaining or even dipping into its capital stock. Income based on the depletion of capital is not sustainable and should not be accepted as income, but only as a consumption of capital. Only the poorest of the poor consume their own substance: they eat up their own capital endowments.

It is therefore the charge and challenge of current generations to leave future generations with more capital per capita.

There are at least four basic forms of capital:

1. *Man-made capital*, produced physical assets of infrastructures, technologies, buildings and means of transportation. This is the manufactured "hardware" of nations. This national hardware must be continually maintained, renewed and modernized to assure its continued productivity, efficiency and effectiveness.
2. *Natural capital*, i.e., nature-produced, renewed and reproduced "inputs" of land, water, air, raw materials, biomass and organisms. Natural capital is subject to both renewable and non-renewable depletion, degradation, cultivation, recycling and reuse.
3. *Human capital* (or human resources) refers to the continued investment in people's skills, knowledge, education, health & nutrition, abilities, motivation and effort. This is the "software" and "brainware" of a nation, perhaps the most important form of capital for rapidly developing nations.
4. *Social capital* is the enabling infrastructure of institutions, civic communities, cultural and national cohesion, collective and family values, trust, traditions, respect and the sense of belonging. This is the voluntary, spontaneous "social order" which cannot be engineered, but its self-production (autopoiesis) can be nurtured, supported and cultivated.

All four of the above *forms of* capital must be developed in a balanced, harmonious ways. The last two forms are currently the most significant and effective in wealth and prosperity creation. The vector or *portfolio of capitals*, its structure and profile, is more significant than its overall aggregate sum. A country that has all or most of its wealth in natural resources might become an international supplier, but it will not necessarily progress per se. Although the tradeoffs among the capitals are often necessary, and sometimes wise and strategically desirable, they are rarely sustainable. The *optimal capital portfolio* could be negatively affected by irreversible or too frequent tradeoffs and substitutions.

In the long run, it appears to be the social capital which provides the necessary supportive infrastructure for human capital to manifest itself effectively. Through renewing primarily both social and human capital, and consequently also man-made and natural capitals, the set of opportunities is being widened for future generations.

Social capital is clearly critical, although one of the most neglected and ignored. It defines people's abilities to work towards common goals and objectives in groups and organizations, form new associations and cooperative networks, and dismantle and slough off the old institutions without conflict or violence. It is the enabling environment for human capital to become effective.

Social capital not only includes business, but also voluntary and not-for-profit associations, educational institutions, clubs, unions, media, charities and churches. A strong civic community is characterized by a preponderance of horizontal organizations, self-reliance, self-organization and self-management. On the other hand, autocratic, centralized and hierarchically vertical organizations are found in societies of lesser trust, lower spontaneous sociability and thus of lower economic performance. The State then has to compensate for the lack of reciprocity, moral obligation, duty toward the community, and trust – a role for which the State is the least equipped and the least reliable to undertake.

Strong cultures, strong spontaneous social orders, and strong levels of civic trust tend to produce higher economic performance and generate wealth, not the other way around. This was powerfully shown especially by Fukuyama (1995). Strong economic

performance and wealth creation are not precursors or prerequisites to strong civil societies.

Nations with weak cultural and civic traditions will generally be poorer, saddled with “strong” governments, relying crucially on their natural resources and man-made capital, and neglecting the social and human spheres of existence. Wealthier and high-performing economies will typically be engendered by nations characterized by strong, dense and horizontally structured cultures of trust, cooperation and voluntary associations.

One would therefore expect the wealthiest nations to have most of their wealth embodied in social and human capital, only a lesser part in man-made or natural capital. This conclusion is supported by the studies of Serageldin (1995) at the World Bank. The following data are a few illustrative examples extracted from these studies. For example, the wealthiest and highest income countries have, on average, only 16% of their total wealth in produced assets and 17% in natural capital, but some 67% in human resources.

It should be noted that the purpose here is not to rank or compare countries, but to emphasize the need for investing in human/social capital in order to realize long-term, sustained economic wealth. The reliance on natural resources only has brought many countries to stagnation and decline.

The poorest countries are raw material exporters, having 20% of their wealth in produced assets, but 44% in natural capital and a meager 36% in human resources.

If we look at a *portfolio of indicators* of the U.S. dollar wealth per capita and the percentages lodged in human/social, man-made and natural capital respectively and *in that order*, we find, for example, the following “wealthy” portfolio profiles:

Italy	(\$373,000; 82, 15, 3)
Belgium	(\$384,000; 83, 16, 2)
Netherlands	(\$379,000; 80, 18, 2)
Japan	(\$565,000; 81, 18, 2)
Switzerland	(\$647,000; 78, 19, 3)
Luxembourg	(\$658,000; 83, 12, 4)

Japan has virtually no natural resources. The accumulated wealth is mostly due to human and social capital investments. These can be compared with some selected “poor” country’s portfolios:

Ethiopia	(\$1,400; 40, 21, 39)
Sierra Leone	(\$2, 900; 14, 18, 68)
Bhutan	(\$6,500; 8, 7, 85)
Zambia	(\$13,000; 9, 18, 73)

The above capital portfolios have so little investment in human and social capital that their future prospects are quite discouraging indeed. On the other hand, there are some poor and developing countries which seem to have the right “mix” of capitals, indicating a possible economic takeoff in the future:

Viet Nam	(\$2,600; 74, 15, 11)
Slovakia	(\$33,000; 78, 17, 5)
Czech Republic	(\$50,000; 66, 15, 19)
Mexico	(\$74,000; 73, 11, 16)
Slovenia	(\$111,000; 67, 16, 17)

Richer countries are generally those which invest more in their human capital, education, nutrition, health care, etc., over longer periods of time.

Some poor countries have relatively high incomes because they do not invest enough into renewing their capital portfolio, but actually consume their capital (consume their next-year plant seed). Especially Sub-Saharan countries have recently registered very high levels of disinvestment, negative savings and capital depletion. Countries of Eastern Europe (most of them, without significant exceptions, no need listing them) are artificially increasing their current incomes for political reasons, but at the cost of depleting their long-term wealth. Without attempting any fashionable and often meaningless comparisons, it is quite discouraging to see many of such potentially promising countries rapidly disinvesting their educational, health care, nutritional and

cultural endowments, slipping into corruption and the anything-goes culture, being still culturally blind to “dirty money” and fashionably myopic about their future.

In many such countries, the sheer number of students has skyrocketed, yet the quality, employability and global impact of their “quantitative” educational institutions has declined. The budget allocation criterion for state-funded institutions should not be the number of accepted students, not even the number of graduated students, but the number of graduates gainfully employed within a year after graduation. These are all very obvious conclusions, but only now are qualitative educational reforms being contemplated.

Many World Bank studies (Serageldin, 1995) have confirmed the leading role of human capital in economic development. With the exception of some raw material exporters, human capital exceeds both natural capital and produced assets combined: sustainable development is best achieved by investing in people. Yet, the bulk of current economic policies remains focused on man-made capital, i.e. on the less than one fifth of total wealth formation. In spite of Serageldin’s studies, even the World Bank and similar institutions have emphasized building assorted “Aswan dams” rather than founding technology institutes and entrepreneurial universities, educating people and expanding their self-reliance and self-managing opportunities and abilities. That is why most of the world still remains poor and poverty is on the rise after some 50 years of misplaced efforts.

Additional arguments along these lines, emphasizing “software” over “hardware”, institutions over dams, and knowledge over information, can be found in Stiglitz (1999) and his World Bank studies on Knowledge Economy.

Many of the misguided policies are the result of naive beliefs and neo-pagan market worshipping, especially in Russia and Eastern Europe. Free-market efficiency is only one of the many by-products of preexisting moral communities. One cannot prefer investing in hardware just because it is easier, measurable, and thus more prone to corruption.

Without moral communities, the unfettered free market is neither conservative nor constructive but a most radically disruptive force, relentlessly dissolving the loyalty of corporations to their communities, customers to their neighborhood merchants,

athletes to their teams and nations, teams to their cities, and so on. Without the culturally preformed, spontaneous social orders of trust, loyalty and reciprocity, a nation cannot achieve and maintain sustainable wealth.

It is therefore necessary to turn our attention to *knowledge*.

Taxonomy of knowledge

What is knowledge?

Knowledge is the purposeful coordination of action. Achieving its purpose is its sole proof or demonstration. Its quality can be judged from the quality of the attainment (its product) or even from the quality of the coordination (its process).

What is meant when we say that somebody knows or possesses knowledge? We imply that we expect one to be capable of coordinated action towards some goals and objectives. Coordinated action is the test of possessing knowledge. *All doing is knowing, and all knowing is doing.*

Every act of knowing brings forth a world. We “bring forth” a hypothesis about the relationships and test it through action; if we succeed in reaching our goal - we know.

Bringing forth a world of coordinated action is human knowledge.

Bringing forth a world manifests itself in all our action and all our being. Knowing is effective [i.e., coordinated and “successful”] action. So, knowledge is *not* information. *Everybody in the world is now informed, only some are knowledgeable, just a few are wise.*

	Technology	Analogy (Baking Bread)	Effect	Purpose (Metaphor)
Data	EDP	Elements: H2O, yeast, bacteria, starch molecules	Muddling through	Know-Nothing

Information	MIS	Ingredients: flour, water, sugar, spices + recipe	Efficiency	Know-What
Knowledge	DSS, ES, AI	Coordination of the baking process → result, product	Effectiveness	Know-How
Wisdom	WS, MSS	Why bread? Why this way?	Explicability	Know-Why

Taxonomy of Knowledge

Our concern, clearly, is the last row of the above table: *the wisdom row*.

While information allows us to do things right (efficiency), knowledge already aspires to also do the right things (effectiveness). Doing the right thing, especially in business, requires not only knowing how, but also knowing why. *Explicability* of purpose is an essential ingredient of its effectiveness in attainment. *Wisdom is about explicability and ethics* of our doing.

Many informed people know what to do, quite a few knowledgeable experts know how to do it, but only a few *wise persons* know why it should (or should not) be done. Wisdom project is of importance to all countries.

Wisdom Project – Expected effects and impacts

- *Sapientia et doctrina* (the motto of my university) should receive real, institutional and global embodiment
- EU schools should differentiate themselves through “wisdom focus” – a powerful recognition attribute, eminently suitable for the global era
- Students and teachers, through all courses and projects, should pursue wisdom: asking Why, expanding inquiry, and embedding strategic thinking throughout

- all individual and institutional learning activities
- Any school can aspire to become an Institution of Inquiry, the “Why?” university, demonstrating its wisdom search embodied within its culture
 - New courses shall emerge and existing courses will be revitalized by the added dimension, completing the chain of data-information-knowledge-wisdom
 - EU schools should assume leadership worldwide in defining, teaching, applying and practicing the wisdom concept, taking it from the realm of philosophy into the realm of human action
 - Because ethics and ethical behavior emerges naturally in response to inquiry, to asking “Why?”, EU should assume leadership in evolving ethics as an integral part of our teaching and doing, not as an “imported” partial focus or dimension
 - Wisdom is a powerful cross-cultural, cross-generational and universally revered concept and EU should assume a leading role in the emerging East-West dialogue
 - Business schools should derive pragmatic benefits and reputation from the active pursuit of concepts like wisdom corporation, inquiring systems, wisdom management, wisdom support systems, and strategy as an attainment of corporate wisdom
 - Strategy, strategic thinking and strategic inquiry should become permanent rather than project-oriented characteristics of business curricula, allowing innovation spirit penetrate throughout the institution

Wisdom: On the Art of Asking Why

Wisdom is *knowing why* things should or should not be done – locally, regionally and globally – and is, and will remain, in short supply. Wisdom is not practiced purposefully and it is not taught at schools.

Asking Why is fundamentally different from asking *How*.

Whenever we explore a coordinated process in the sense of *What* or *How* (What is to be done, how sequenced, how performed, etc.) we already accept and fixate that

process. The process is becoming *a given*, subject to learning or mastering, but not subject to exploration or change.

It is only when we start asking *Why* (Why to do it at all, why this operation and not another, why this sequence, etc.) we question the very structure of knowledge (coordination of action) and introduce the possibility of change. The *Whys* and the *Why Nots* are the most important questions in business and management and they should not be taken as givens.

In the global economy, frequent or continuous strategic change will become the norm of competitiveness. Doing the same, given thing better and better (continuous improvement) will be inadequate for strategic success. One has to *do things differently* (not just better) and *do different things*, not just the same ones. Such an important mode of strategic thinking cannot be learned and mastered by asking *How*, but mainly by asking *Why*.

Strategy and strategic action

All presented concepts of “the spine” of the 4Es and the taxonomy of knowledge have one important thing in common: they are all about *action*, all about *doing*.

Only information is always and only about descriptions. *Information is a symbolic description of action*, past, present or future. Yet, business is not about managing descriptions, but about managing action. So, the need to move from information to knowledge and wisdom is tantamount to moving from words to deeds.

Wisdom project would usher in a new era of global corporate strategy. Strategy also is not about statements, but about action. Traditionally, organization executives prepare a set of statements, descriptions of future action: mission, vision, set of goals, plan or pattern for action and similar artifacts. All such statements are information. It all remains to be translated into action, into corporate knowledge.

Strategy is about what we do, not about what we say we do or desire to do. Strategy is about action, not about the description of action. Strategy is about doing, not about talking about it.

Your strategy is what you are doing. And what you are doing is your strategy.

All the rest is words.

Because all organizations do something, all organizations already have a strategy. Their executives should stop managing information by issuing statements and start managing knowledge by coordinating action.

Let us at least outline the steps and proper sequencing of the strategic process:

First, we have to create a detailed map of key corporate activities to find out what company is doing – to reveal its actual strategy that is embedded in action. Remarkably, many corporations do not know their own processes, what they are doing; do not know their own strategy. They only know what they say, through their mission statements.

Second, after creating coherent activity map, one has to analyze the activities by comparing them to benchmarks of competitors, industry standards or stated aspirations.

Third, so called value-curve maps are produced in order to differentiate one's activities from those of the competition. Differentiation, not “catching up” or imitation is the key to effective competitiveness and strategy.

Fourth, identified selected activities are changed – in order to fill the opportunity spaces revealed by value-curve maps – as being most effective for successful differentiation. The rest of action space is conserved.

Fifth, after a newly changed action space (and its activity map) has emerged and become reliably functional, the descriptive mission and vision statement can be drawn for the purposes of communication. The description now actually describes the action and the action reflects the description.

Wisdom and Ethics

Wisdom and ethics are clearly closely related, often being indistinguishable and inseparable. An unethical person cannot be considered wise. Both concepts are related to strategy and strategic action.

Also ethics, in this context, is about action, about doing.

The most remarkable lapses in ethical behavior have occurred at companies with admirable ethical rules and covenants, stunning ethical vision statements and other elaborate props that simulate and substitute for ethical know-how. Enron's walls were

covered with descriptions and statements on ethics. The problem with corporate ethics is not with “knowing” what is right, but with doing right and being good.

Truly ethical behavior does not come from deliberate judgment, decision making, reasoning and learning the rules, but from human coping with immediate circumstances, from *being and acting good*, not just describing what “good” means, out of context and devoid of action.

It is clear that teaching ethics, i.e., providing descriptions, does not necessarily lead to ethical behavior and deeds, to being good and wise.

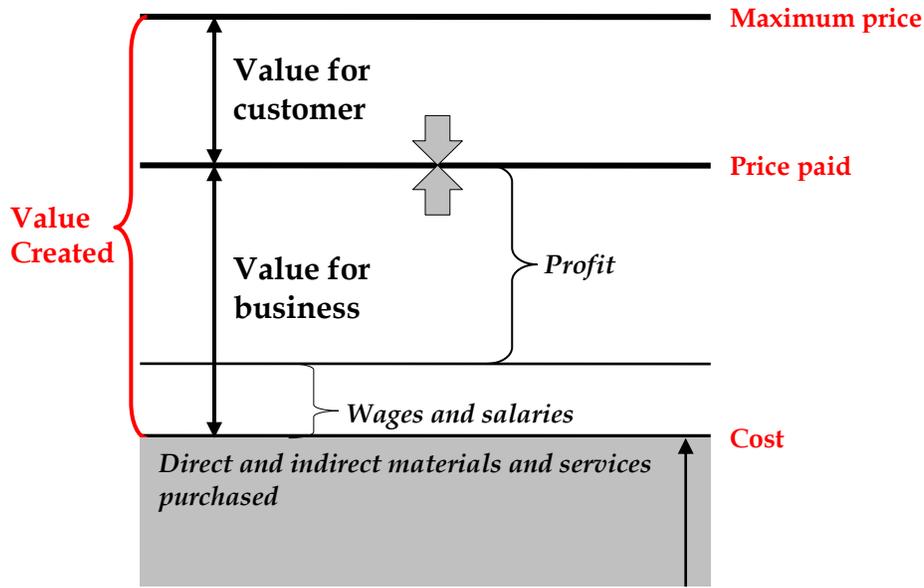
There is a difference from reading or learning an ethical rule, and putting it into action consciously and purposefully, or acting ethically through mastering one’s microcontext, i.e., *acting ethically* through one’s own internal self-interest. In order to be truly ethical, one cannot be consciously and intentionally “ethical.”

All about adding value

Knowledge is measured by the value our coordination of effort, action and process adds to materials, technology, energy, services, information, time and other inputs used or consumed in the process. *Knowledge is measured by added value.*

In any business (and human) transaction, value has to be *added to both* participating sides: the provider *and* the customer. Adding value is what makes the transaction satisfactory and sustainable.

There are two kinds of value to be created: *value for the business* and *value for the customer*. Both parties must benefit: the business – in order to make it; the customer – in order to buy it. In the global age it is precisely this business-customer *value competition* that is emerging as the hardest and the busiest battleground.



Adding Value for the Customer

In the above figure we attempt to explain the process of creating new value. This is crucial for the identification and assessment of innovation.

First, the customer pays for the service or product: the *price paid*. The producer subtracts the *cost incurred*, including all direct and indirect materials and services purchased. The difference is the *added value* for the business. This added value can also be interpreted as the *value of knowledge* engaged in producing the service or product. In order to pay wages and salaries, the production process and its coordination must generate this added value. Added value is the only source of corporate wages and salaries and profits.

If the added value does not *cover* the wages and salaries, then these must be correspondingly lowered. If no value has been added, then the value of knowledge is zero and no payment can be attributed to it. The business must add enough value in order to *cover* at least its workers and managers, their salaries and wages. If even more value has been created, then *profits* can be realized, up to the price received.

The customer, of course, must be willing and ready to pay more for the service/product than he actually paid. The *maximum price* the customer would be

willing to pay must exceed the price the producer has asked for. The difference is the added *value for customer*.

If there is no value for customer – the maximum price is lower than the price to be paid – then the customer would not buy the service or product.³ In a competitive market, the customer pays money only for the value received, i.e. the value for the customer.

The Entrepreneurial University

We are entering an era of re-assessment of business programs, shifting from description of action (functional, “scientific” model) towards action itself, i.e. an *entrepreneurial model*.

It is being realized globally that business is a *profession* and business schools are *professional schools*, like schools of medicine and law. Professions are always more about knowledge and wisdom, less about information, always more about doing and less about describing.

It is challenging to contemplate why business schools model themselves more on physics, chemistry and economics and less on medicine and law.

Business *IS* a profession.

Professions work with an *accepted body of knowledge* (not information), *certify and guarantee* acceptable practice, are *committed to the public good*, and rely on an enforceable *code of ethics*.

Professions integrate knowledge and practice in a wise and ethical way, serving the public, focusing on clients’ needs.

Education in business must involve history, moral reasoning, theology, logic and most importantly: practical *knowledge, wisdom* and *ethics*.

Bennis and O’Toole recently wrote: “*The problem is not that business schools have embraced scientific rigor but that they have forsaken other forms of knowledge.*”

³ Unless *forced to* by circumstances of monopoly or the lack of alternative choices.

Every business school should run its own business, as proposed by Polaroid's E. Land. This need for practice, innovation and entrepreneurship takes us to the notion of the *entrepreneurial university*.

The entrepreneurial university not only produces knowledge (rather than information) but engages in a new mission of *capitalization of knowledge*. It produces not only graduates and alumni, but also firms and companies: it becomes an economic actor in the regional and possibly – through a network – also in global economic and social development. This new mission puts the university into direct cooperation with the state and corporate sectors, forming the *triad of cooperation*.

From the original “conservatory” of information and knowledge, through the producer and transmitter of information and knowledge, to the *university as an entrepreneur* – that is the vision which the triune EU network of alliances would be preeminently and prominently *positioned* to assume global leadership in translating into reality.

The university-industry-government is the proper triad for successful regional development. *New firms and their capitalization* is the proper output of a professional, entrepreneurial school. One-way, linear outflow without feedback is replaced by a self-sustaining cycle of knowledge and wisdom.

The entrepreneurial university still produces graduates and publications, of course, but “packages” them in firms and companies to take the created knowledge out with the newly minted entrepreneurs.

The trend is towards global alliances and networks in business and economic cooperation. It is moving away from self-absorbed islands of bureaucracy and political roller-coasters. Education, entrepreneurship and innovation are the next frontiers, even for Europe.

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