

Towards a Radical Reformation of Economics Education: Pluralist and Heterodox Perspectives

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Overview: Our generation is confronted with many problems including climate change, a global financial crisis, a palpable disparity in income and wealth, and a health care crisis. These problems are mutually reinforcing and will only worsen. At the center, however, is the discipline of economics itself and economics education, which obfuscates the interrelationship of our problems, inures its students to human suffering and abnegates thoughtful discussion of the human predicament. This paper will briefly discuss the problem of economics education, and then present a vision for a radical restructuring of the economics curriculum.

Section 1: Introduction

Alfred Marshall, in the eighth edition of his *Principles of Economics*, wrote that “economic conditions are constantly changing, and each generation looks at its own problems in its own way” (Marshall 1946 [1920], p.v). Our generation is beset with many problems including climate change, a global financial crisis, a palpable disparity in income and wealth, and a health care crisis. These problems are mutually reinforcing and will only worsen. At the center, however, is the discipline of economics itself and economics education, which obfuscates the interrelationship of our problems, inures its students to human suffering and abnegates thoughtful discussion of the human predicament.

To date, calls for reform of economics education within the neoclassical paradigm have been tepid, content with tinkering around the edges, adding less chalk to more talk, while leaving the bulk of the curriculum intact. Despite the persistence of one of the worst recessions in recent history, and the collective failure of neoclassical economics to predict or understand it, “the generals of [the] mainstream status quo, along with middle ranks, show no signs of giving ground or even of feeling the need for appeasement” (Fullbrook 2010, p. 94). The crisis “doesn’t seem to have any decisive impact on the way economics is taught and the trends in economic research” (Otsch and Kapeller 2010, p. 22). The emphasis is overwhelmingly on ‘more of the same.’

No better example than Gregory Mankiw, author of one of the best selling textbooks, writing during the depths of the financial crisis, “We still have to teach the bread and butter issues, the gains from trade, supply and demand, the efficient properties of markets and so on. These topics will remain the bread and butter of introductory courses” (Mankiw 2009).

What is wrong with neoclassical economics that precludes a honest re-assessment? Where is the humility? Where is the umbrage? Where is the mea culpa of university professors, textbook authors and publishers and the willingness to go back to the drawing board?

Imagine "if universities continued to use for nuclear engineering a textbook by an engineer who had headed a team managing a nuclear power plant that without external causes exploded creating a huge devastation, there would be a public outcry" (Fullbrook 2009, p. 22). Or imagine the outbreak of a disease, an epidemic, that caught the medical profession unaware, with most of the profession (and textbooks) fastidiously denying the epidemic's possibility. Wouldn't there be a public outrage? A energetic demand to hold the culpable accountable?

Why is such a similar situation tolerated in economics? Why isn't there a public effort to disbar economists who continue to teach such failed policies? Why isn't there an effort to de-commission the universities that grant such degrees? Why isn't there a detailed public commission to ascertain what is taught in economics courses and published in economics textbooks?

Imagine a book written for economics students that describes in detail what is missing and wrong in their textbook so that they "can begin to think critically about what they read in their textbooks, to defend themselves against the unconscious acceptance of ideology" (Hill and Myatt 2010, p. 2).

Unfortunately we don't have to imagine- such a book has been written (Hill and Myatt 2010). The book's title, *The Economics Anti-Textbook- A Critical Thinker's Guide to Microeconomics* acutely underscores the problem: students need a book not as a helpful guide in learning complex material but to unlearn what is written in their texts.¹

Four reasons explain the collective failure of neoclassical economics to reform. One, a reluctance to admit that one's life work has been in vain. For a discipline that claims rationality, it is hard for established practitioners to jettison their life-long beliefs in favor of a new paradigm. And sadly the myopic and fundamentalist limitations of their education precludes understanding of the manifold alternatives.

Two, the basic institutions of neoclassical economics: university departments, associations, journals, classification systems, economics 101 textbooks, and its basic narrative, collectively and interactively block any effort at meaningful reform (Fullbrook 2010, p. 95). Fullbrook notes that "this intransigence and insuperability stems from the fact that as institutions, although independently constituted, they are interlocking and their characteristics inter-determined" (Fullbrook 2010, p. 95).

¹ While this book only tackles one subject in economics- microeconomics, the malaise and disconnect described by Hill and Myatt unfortunately affects all subjects within the discipline of economics. Expect more such books to be written.

Three, given that the ascendancy of neoclassical economics did not occur as the result of the fair choosing of ideas within a democratic forum, but rather as the result of bullying, cajoling, threatening, expelling, disparaging, etc., (Lee 2009, *passim*), it would be naive to expect neoclassical economists to voluntarily relinquish their ascendant paradigm without a fight. But don't expect a fair fight. The contest over economic paradigms has never been a fair fight: the dice have been loaded. Bullying is the most apt descriptor of the relationship between neoclassical economics and any potential threat (Lee 2009, *passim*); and not surprisingly, such bullying is also a central feature of neoclassical pedagogy (Fullbrook 2009, p. 19).

Four, uniting each of the above three and, important in its own right, is economics education, which in my opinion can best explain why neoclassical economists could not predict the recent crisis; why they are ignorant of alternative paradigms; why they obstinately cling to failed policies; and why they chastise and bully dissenters. Indeed, "economics [and economics education] as currently constituted and practiced, acts as a most effective barrier against the understanding of these problems" (Schumacher 1989, p. 50); and as Keen has noted, "economists may be the main force preventing the introduction of countervailing measures to any future economics slump. Economics may make our recessions deeper, longer and intractable, when the public is entitled to expect economics to have precisely the opposite effect" (Keen 2011, p. 1).

We need economics and we need economists to help fix our problems but more importantly we need educated (and not proselytized) economists. Economics education is a problem of our generation and must be radically reformed.

Section 2: The Problem with Economics Education

One of my students wrote on a recent exam, "I took two economics classes before yours, and I had a hard time finding a relationship between the study of economics, firms and the entire society." Given that the overall objective of economics is the study of the economy (isn't it?) and given that the economy is comprised of firms and individuals, isn't this a damning criticism?

If this was an isolated comment, I could cavalierly dismiss it, but I hear it time and time again. My heart stops when students tell me that they were excited to begin their study of economics only to be turned off by an onslaught of deductive logic and abstract models with little resemblance to the world in which they live. Indeed, "in the business, government and other non-academic communities, the perception is widespread and growing of economics as a technical and rarefied discipline, of questionable relevance and limited practical use" (Hodgson 2001, p. 9).

Imagine a physicist being told that her lectures had nothing to do with the physical world; or an anatomy professor being told that his lectures had nothing to do

with the human body. Wouldn't there be umbrage; a humbled admission of fault and a dedicated desire to amend the pedagogy?

Not so with neoclassical economics, which claims that "economics isn't defined by its subject matter but by its way of thinking" (Coyle 2007 p. 231-232). No wonder students are perplexed when they open up a textbook and expect to learn about the economy in which they live and (will) work, only to be told that economics is about allocating scarce resources among unlimited wants and then hit with an abstract production possibilities to drive home the point.

The problem with neoclassical pedagogy isn't too much math -- actually quite the opposite: it uses the wrong math- simple calculus -- to study the wrong problem- optimization; and even worse, its math is bad math -- a distorted and misunderstanding of the limitations of mathematics (Keen 2011, pp. 402 – 411). Nor is neoclassical economics too complex: as a former physics major who switched to economics, I found it deceptively simple; and perhaps this is its appeal. Keynes' observation on the "the completeness of the Ricardian victory" is apropos,

"That it reached conclusions quite different from what the ordinary uninstructed person would expect, added . . . to its intellectual prestige. That its teaching, translated into practice, was austere and often unpalatable, lent it virtue. That is was adapted to carry a vast and consistent logical superstructure, gave it beauty" (Keynes 1936, p. 33).

The problem with neoclassical pedagogy is threefold: First, a disconnect between what is taught as subject matter and how the world works. Simply put, neoclassical economics has failed to construct a workable model that reflects the world in which we live. Rather than teach students how real firms operate in real industries, students are instructed to assume rationality of individual actors and then analyze hypothetical firms in idealized industries, with "fictitious values invented at the desk of the textbook author in order to fit the courageous assumptions necessary for developing the respective economics model" (Otsch and Kappeller 2010, p. 17).

Second, the wilful ignorance of the social sciences and the physical sciences, particularly physics and mathematics,

"In other sciences, chaos theory, complexity analysis and their close cousin evolutionary theory have had profound impacts. It shows how isolated economics has become from the scientific mainstream of the late 20th and early twenty-first century that such ignorant views could be commonplace" (Keen 2012, p. 410).

Third, neoclassical pedagogy is anti-pluralist. Instead of enabling students to grasp the complexity of our problems with a multi-faceted emphasis on different theoretical and empirical approaches, neoclassical economists train students to think like economists- as if all economists think alike- and that only one perspective exists, while denying the legitimacy of all others.

Take Diane Coyle's chastisement of John Kenneth Galbraith,

"We in the profession count Paul Krugman as a bona fide economist . . . but the reason many economists think Galbraith wasn't one of us lies in his methodology. His work covers the terrain of economics . . . but it uses the methods of sociology and history. . . many of us spurn Galbraith because he wasn't a modeler" (Coyle 2007, p. 232).

This is notwithstanding Galbraith's presidency of the American Economic Association and his authorship of numerous books that explained in lucid prose how the economy works. But what is wrong with neoclassical economics that it disparages Galbraith's methodology because it is different?²

And needless to say only one conceptualization of a modeler is taught, tolerated and accepted for publication in the leading neoclassical journals. Economists who challenge the accepted dogma and/or develop alternative model conceptualizations are ostracized. In this sense neoclassical pedagogy is no different from fundamentalism which is defined by the "zealots' intolerance while presenting themselves as the true guardians of orthodoxy" (Bruce 2008, p. 2 and p. 100). If we don't tolerate fundamentalism in our universities why should we tolerate the teaching of neoclassical economics?

We have abnegated the lofty goal of educating our students in lieu of the easier (yet ethically questionable) goal of prosyletization.

² The invidious term 'one of us' comports with the ubiquitous statement found in neoclassical textbooks that the goal is to teach students to think like an economist- as if we all think alike. Shouldn't our goal be to educate students so that they understand history, sociology, psychology, etc., and can work with other social scientists to address the many problems of our generation? No wonder neoclassical economists cannot understand power and the historical evolution of institutions.

Section 3: Solutions

I am inspired by William Lloyd Garrison, who began publishing *The Liberator* in 1831 and vowed to continue until the abominable injustice of slavery was outlawed. Our generation is also enslaved by an outdated and unrealistic neoclassical economics that ignores pressing environmental realities and inures its practitioners to our generation's many problems. Keynes is once again apropos, "That it could explain much social injustice and apparent cruelty as an inevitable incident in the scheme of progress, and the attempt to change such things as likely on the whole to do more harm than good, commended it to authority" (Keynes 1936, p. 33). Reforming and reconceptualization of economics education is our most important task.

As founding editor of a journal on pluralism, it is assumed that I fully endorse pluralism as a ubiquitous solution.³ While different definitions of pluralism exist (is this surprising?) and pluralism exists on numerous levels- ontological, epistemological, methodological and pedagogical -- pluralism simply defined as the legitimate right of different viewpoints to exist is a necessary ingredient in the reformation of economics education for several reasons. One, pluralism ensures vitality and innovation since, "in ideas, as in nature, *variety is the evolutionary fuel*. When pluralism and variety disappear, innovation and progress may slow to a halt. . . Pluralism is necessary for innovation and scientific advance" (Hodgson 1999, p. 13, emphasis in original).

Two, only pluralism is consistent with democracy and only a democracy in ideas is consistent with the ideals of a university.

Three, pluralism exposes students to different viewpoints pluralism, "so they can debate their relative merits and develop and awareness about the weaknesses and strengths of competing theories" (Ostch and Kapeela 2010, p. 23).

Four, pluralism is useful because, "no paradigm or theoretical perspective can claim universal applicability, i.e., usefulness for all kinds of all problems. Each paradigm or theoretical perspective may have something to offer and preference for one theoretical perspective over another is . . . partly a matter of ideology" (Soderbaum 2008, p. 10).

And five, given "the presence of values and ideology in social science research... a complementary relationship between theoretical perspectives or paradigms, each reflecting a specific ideological viewpoint is relevant" (Soderbaum 2008, p. 41).

Six, only pluralism can instill passion into economics; and passion is necessary to "identify redressable injustice" (Sen 2009, p. vii) which in turn is necessary to give us the intellectual courage to help solve the problems of our generation. As Joan Robinson exhorted, "independent economists ought to be speaking up on the side of humanity" (1980, p. xiii); and we should not be ashamed to be passionate. We should, however,

³ For an introduction to the historical evolution of pluralism please see (Negru 2009; and Negru 2010)

be ashamed to hide behind the ideological cloak of positive science, which other social scientists jettisoned long ago. Neoclassical economists, still stuck in the 19th century, has inured its students to “redressable injustice” while fastidiously extirpating passion.

And finally, if a reformed economics is to help make the world a better place, and it must, then economics must be concerned with justice, which in turn is interconnected at many levels with pluralist dialogue since, “not only are dialogue and communication part of the subject matter of the theory of justice . . . it is also the case that the nature, robustness and reach of the theories proposed themselves depend on contributions from discussion and discourse” (Sen 2009, pp. 88-89). To be passionate about economics requires being able to recognize injustice, which in turn requires an understanding of power and how institutions evolve, which in turn requires an open mind and a willingness to learn from other disciplines.

Despite the virtues of pluralism, it is a necessary but not sufficient element in reform,

“Pluralism, both its ethos and epistemology, is extremely important, but no matter how robust it may become among economists it will never be a sufficient basis for breaking the hegemony of neoclassical economics. That will require a new cohesion of underlying economic ideas other than the neoclassical ones and which heterodox schools will in the main accept and, even more importantly, which their members will become in the practice of relating to their particular school of thought as they currently do with neoclassical ideas.” (Fullbrook 2010, p. 101).

In addition, another palpable problem is that although “heterodox economists are willing to engage in pluralism the mainstream economists generally do not reciprocate” (Lee 2009, p. 283, note #26).

Given this intransigence many heterodox economists insist on developing a robust heterodox research program, while developing a vibrant heterodox research community,

“Heterodox economics [must] be taught to more students, that more doctoral students be produced, and that heterodox economists become more professionally and theoretically engaged through joining multiple heterodox associations, subscribing to multiple heterodox journals, attending multiple heterodox conferences and engaging in open pluralistic theoretical dialogue with other heterodox economists [and must] challenge the research assessment exercises, subject benchmark statements, and the mainstream ranking of journals and departments” (Lee 2009, p. 206).

All in good, and to this I would add continued support of the World Economics Organization in order to attenuate the hegemonic grip of the American Economic Association and neoclassical economics (Fullbrook 2010).

At the same time it is necessary to change, redo and reconceptualize neoclassical economics. If we don't, they will continue to bully, exclude, disparage and discredit, while using the powers of the state to cement their ascendancy. It is in the best interest

of heterodox economics, economics in general, and our students to add 'reconceptualization of neoclassical economics and pedagogy' to our agenda.

Obviously neoclassical economists insist on the continued teaching of neoclassical economics – they do not know any other alternatives; but heterodox economists do, so why do some (not all) insist on teaching neoclassical economics? Several reasons are usually given. One, if we are to change neoclassical economics we must understand it. Two, neoclassical economics is, for better or worse, the lingua franca, so one must understand it. Three, it is often the foundation upon which policy is built. Four, knowledge of neoclassical economics can chip away at the edifice and establish ports of entry, in order to establish pluralist dialogue. Five, exposure to neoclassical economics is necessary in order to understand multiple viewpoints.

Although I see merit in some of the above arguments, I respectfully disagree with my colleagues that we should continue to teach neoclassical economics. I don't know of any other science that insists on teaching failed, out-dated models. A discipline should move on; there should be no reason why the rest of the profession feels obliged to continue to teach this stuff. Perhaps in a history of thought course; or in a course on logic; or as part of a course that introduces multiple viewpoints, but never alone, and not in a course on the economy, since "neoclassical theory . . . does not show how real markets work" (Otsch and Kapeller 2010, p. 21). Given that neoclassical economics is not really about the economy, it "is inadequate for the analysis of institutional structures such as markets" (Hodgson 1999, p. 44). And Keen once again,

"Neoclassical economics, far from being the font of economic wisdom, is actually the biggest impediment to understanding how the economy actually works – and why, periodically, it has serious breakdowns. If we are ever to have an economic theory that actually describes the economy, let alone help us manage it, neoclassical economics has to go" (Keen 2011, p. 15).

The opportunity cost is too high to continue teaching neoclassical economics, especially if we are develop sufficient knowledge to help solve our generation's problems, which can only come from a vigorous heterodox research agenda and the continued building of the heterodox community. But integral to this research agenda is the reconceptualization of neoclassical economics, a task we must take head-on.

Fred Lee reminds us,

"While it is becoming increasingly the norm that bullying, sexual, religious, and ethnic harassment, and threatening behavior is unacceptable in the workplace, the subtle and not so subtle academic equivalents of these actions are commonplace in many departments where heterodox economists teach and engage in research" (Lee 2009, p. 222).

And if we don't take reformation of neoclassical economics head-on it will continue to dominate, to influence public policy, and to infect the baggage of the intellectual elite; and we will be relegated to the status of second class citizens, regardless of how vigorous and robust our research agenda.

The goal is to reconceptualize neoclassical economics so its practitioners are no longer obdurate and unwilling to notice, discuss and accept alternatives. Only then can the "universal mindset of the neoclassical project" (Fullbrook 2010) be broken. Easier said than done! And, and like William Lloyd Garrison, we are in this for the long haul; but nevertheless, this is a necessary and important battle. But how to teach open-mindedness and toleration? While much attention has been devoted to 'how to' for individual courses and 'how to' redesign the curriculum, the remainder of this paper will focus on policy which is a prerequisite for the efficacy of all others.

Otsch and Kapeller call for "additional courses in related areas such as economic history, sociology, political science or philosophy in order to provide students with some context knowledge on economic systems (what is the history of an economy? Where do its institutions come from? What's the relation between economy and society?" (Otsch and Kapeller 2010, p. 23).

I agree, but argue that this should be carried to its next logical step that economics majors should not take any economics courses until after the first year of university study. Instead, they should take (at least) the following courses during their first year: World Literature, History of Capitalist Systems, History of Intellectual Thought, Quantum Physics, and Philosophy. Here is my rationale:

World Literature - There is no better primer on the diversity of the human condition than fiction. Properly taught, fiction can explain the myriad forms of behavior and human predicaments as good, or even better, than any individual academic discipline.

History of Capitalist Systems - It is essential for economics majors to understand how the present system of capitalism has evolved, the role of government and how people respond to contemporary problems by constructing appropriate institutions.

History of Intellectual Thought - A course in the history of intellectual thought will elucidate how ideas developed in response to certain problems; and students will understand how and why economic theory was developed.

Quantum Physics - not only are many of the accouterments of capitalism, such as the CD, laser, computer, MRIs and traffic lights the result of the intellectual achievements of quantum physics, but no better example exists of the scientific spirit - the willingness to test and experiment and the openness to reform theory if necessary - than quantum physics. In addition, and especially relevant, "the rise of quantum theory is . . . an outstanding example of the revisionism imposed by physical reality upon the thinking of the scientist" (Polkinghorne 2002, p. 85). Compare this to the dismal record of neoclassical economics (Keen 2011, passim) and economics textbooks which "often

present hypotheses and policy prescriptions with surprisingly little or no supporting evidence, or (worse) they ignore inconvenient contrary evidence” (Hill and Myatt, 2010, p. 6).

Philosophy - An introductory course, perhaps with a focus on ethics aptly illustrates the tradition of philosophy for listening, debate and pluralism.

Although some economists might object that these prerequisites would constrict the course offerings for the economics major, so be it. At the same time, these suggested courses are fundamental to a university education and will produce better educated (rather than trained) economists, able to converse intelligently with all social scientists. Such prerequisites will also enable students to parry the inevitable ideological onslaught in later neoclassical courses.⁴ And of course this doesn't assume that any of these disciplines are without problems of their own

In order to solve our generations many (and interconnected problems) we need economists who are educated and not proselytized; we need economists who are humble enough to realize that any model has limitations and thus can never be perfect and that as social scientists we must learn each other.

Section 3: Conclusion

Speaking of fundamentalism, in closing I would like to mention a provocative yet disturbing book (Shearman and Smith 2007). Provocative because it made me think about the relationship between pluralism and democracy and disturbing because I feel the prognosis the authors laid out could very well happen. The authors argue that our most important problem, bar none is climate change, and we are inexorably headed toward cataclysmic change. To avoid this, or perhaps at least to attenuate it somewhat, Shearman and Smith advocate dismantling our current university system (which only produces graduates who are ecologically ignorant and replace it with a real university, producing philosopher-warriors who can understand our ecological predicament. Their rationale is worth quoting in full,

“The conventional university trains narrow, politically correct thinkers who ultimately become the economic warriors of the system. Our proposal is to counter this by an alternative framework for the training and complete education of a new type of person who will be wise and fit to serve and to rule. Unlike the narrowly focused economic rationalist universities of today, the real

⁴ Hill and Myatt hope “to help stoke the fires of revolution” (2010, p. 2) from below by peppering their text with ‘71 Questions for Your Professor.’ While many professors welcome the give-and-take in a college classroom and relish the opportunity to learn from their students, these questions go far beyond prepping students with thoughtful questions. They are designed to reveal the ignorance of neoclassical economics professors of their own discipline, their lack of understanding of alternative theories and their willful neglect of conflicting evidence. Nevertheless, the fact that Hill and Myatt’s book was written in the first place suggests the seriousness of this problem.

university (special institutions in which the opportunity is provided for the much-needed ecowarriors to develop and be nurtured) will train holistic thinkers in all of the arts and sciences necessary for tough decision making that the environmental crisis is confronting us with. These thinkers will be the true public intellectuals with knowledge well grounded in ecology. . . We must accomplish this education with the dedication that Sparta used to train its warriors. As in Sparta, these natural elites will be especially trained from childhood to meet the challenging problems of our times" (Shearman and Smith 2007, pp. 134-135).

Aside from the undemocratic nature of such training, that the educators are proseyltized rather than educated, and that such a proposal will disenfranchise large segments of the population, who is going to educate the educators? And on what basis will knowledge progress? This book presents a sober warning that with a sudden cataclysmic and irreversible change in climate, democratic debate will cease. Despite their abysmal track record, neoclassical economicists by default might be thrust upon the world stage as the elite corps abetted by the power of the state, which itself will be under seige.

If a cataclysmic climate event occurs, would the average citizen side with heterodox or mainstream economists, on the basis of name only? I am thinking about the unfortunate appellation for the Mensheviks (Minoritarians) vis-a-vis the Bolsheviks (Majoritarians) given when several factions walked out before a key vote among the Social Democrats in pre-revolutionary Russia in 1903, giving Lenin and his group (or more accurately Lenin himself) a majority. Figes writes, "With hindsight it is clear that the Mensheviks were very foolish to allow the adoption of these names. It saddled them with the permanent image of a minority party, which was to be an important disadvantage in their rivalry with the Bolsheviks" (Figes 1996, p. 152).

I realize many of us are proud of the heterodox identifier⁵ but perhaps we could experiment to see what name resonates best with the public? Why not 'real economists' or 'world economists?' Maybe the latter might resonate well as climate change worsens? Why cede to neoclassicals the word orthodox when the knowledge produced by heterodox economists is fast becoming orthodox? Doesn't this 'saddle' us with the permanent image of a minority party?

The possibility of a cataclysmic climate event gives another reason why we should give due diligence to reconceptualizing neoclassical economics and make this part of the heterodox agenda.

Economics education is in crisis: It needs a drastic overhaul and complete makeover. It is not enough for heterodox economists to continue to produce a research agenda in order to better understand the provisioning process; for even if this is done neoclassical economics will continue to discriminate, disparage and ostracize no matter how fecund and robust our research agenda. Its ill-founded and erroneous generalities will continue to infect the intellectual baggage of the elite. Thus, it must be a central objective of heterodox economists to actively dismantle the hegemony of neoclassical

⁵ For an interesting genesis of the heterodox identifier see (Lee 2009, pp. 189-192).

economics; if we don't know one else will, and it will certainly not happen on its own. We must add this to the agenda of heterodox economics.

If we are to break the hold of neoclassical economics, we must radically reform education. I view this as our most important endeavor and the best investment we can make for the next generation.

Schumacher wrote that education is "the most vital of all resources" (Schumacher 1989, p. 84) and indeed "education is our most important function as human beings: it is an investment in ourselves, future generations and the planet" (Reardon 2009, p. 267). To paraphrase C.P. Snow, "there is no excuse for letting another generation be as vastly ignorant" (Snow 1998, p. 61). We need a radical reformation in economics education.

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