



Thorpe, C. (2008). Capitalism, audit, and the demise of the humanistic academy. *Workplace*, 15, 103-125.

Capitalism, Audit, and the Demise of the Humanistic Academy

Charles Thorpe

The bourgeoisie has stripped of its halo every occupation hitherto honoured and looked up to with reverent awe. It has converted the physician, the lawyer, the priest, the poet, the man of science, into its paid wage laborers.

Karl Marx and Frederick Engels 1

Introduction

Today, British universities are in a state of crisis. This is widely recognized as being an economic crisis, an issue of under-funding and of overly rapid expansion relative to funding. However, it is also a crisis in the very idea of the university as an institution, revealing an evaporation of meaning in the academic vocation. As the traditional values and motivations animating academic work are de-legitimized, and even publicly derided, in their place we find the complete subordination of intellectual life to instrumental values and, most brutally, to the measure of money.²

When, a few years ago, the then Education Secretary Charles Clarke dismissed as redundant the model of the university academic as a “medieval seeker after truth” and asserted that instead “universities exist to enable the British economy and society to deal with the... rapid process of global change,” his comments were in perfect alignment with the trajectory of higher education policy since the early 1980s.³ This stream of policy has sought to shift the universities away from institutional self-definitions framed in terms of the pursuit of liberal-humanist cultural values and towards primarily economic goals. The pejorative labeling of truth-seeking as “medieval” has a rhetorical function in delegitimizing value-frameworks other than economic value. Such rhetoric is part and parcel of New Labour’s defining of ‘modernization’ as neoliberal globalization.

Clarke’s comments also echoed American advocates of the ‘entrepreneurial university’—for example Chancellor Robert Dynes of the University of California, San Diego, who similarly asserted that “[a]s scholars, we should not seek knowledge merely for its own sake. We should seek knowledge that has real value for us and for our community.”⁴ “Real value” translates into monetary value as knowledge is commoditized through patents, spin-out companies, and contract research. As the Keynesian state is replaced by

what sociologist Bob Jessop has termed the “Schumpeterian competition state,” the primary role of the university is seen to be in technological innovation, providing intellectual resources to be “leveraged” for regional and national competitiveness.⁵ As universities are expected to play a direct role in capital accumulation (rather than the indirect role previously assumed), the humanist value of “knowledge for its own sake” traditionally associated with these institutions increasingly struggles for legitimacy. Also, any critical role for academics as intellectuals in relation to the state and society becomes increasingly incompatible with the institutional self-definition and relations of the contemporary university.

This crisis of values in academic life is symptomatic of the broader crisis of liberalism and of the intellectual role in globalized capitalism. The values in terms of which academic mores and ways-of-going-on have been formulated and defended have largely been those of liberal humanism. The core value of ‘academic freedom’ has been largely framed in terms of liberal conceptions of civil freedom. Yet, an aspect of capitalist global hegemony, particularly since the collapse of the Soviet Union, has been the erosion of liberal humanism. Contemporary globalized capitalism is casting off its increasingly inconvenient liberal humanist ideological shell. The official derision of the value of “knowledge for its own sake,” as well the apathy of academics with regard to defending it, instantiate the way in which liberalism is less and less effective in constraining the brute force of capitalism.

The contemporary crisis also highlights the internal contradiction between the instrumentalist aspects of liberalism and the substantive humanist aspects. As a result of this contradiction, the liberal conception of academic freedom is an inadequate basis on which to oppose the current instrumentalization and commodification of academic knowledge. Responding to the current crisis requires reassessment of the ethical foundations of academic life and the formulation of a new ethos and politics of intellectual freedom. Academic freedom needs to be conceptualized in terms which connect it with broader social and economic struggles against corporate managerialism and for control of the conditions, measure, and goals of work.

The RAE as Instrumentalization and Commodification

It has become clear in Britain that the neoliberal rhetoric of promoting the free market and entrepreneurialism has been inextricably tied to the expansion of central government power. In relation to academia, this has meant that, while drawing legitimacy from the notion of promoting “entrepreneurialism,” the government has directly subordinated universities to central bureaucracy and turned universities from relatively autonomous components of civil society into policy instruments of the state. This has been accomplished through the use of audit to impose on higher educational institutions a particular mode of governmentality. Making universities “entrepreneurial” has translated into making them governable by the central state. It was part and parcel of Margaret Thatcher’s program to “destroy the ‘privileges’ of established institutions so as to enlarge the relative weight of the governing party,” a program of the centralization of power continued under New Labour.⁶

A governmental audit, the Research Assessment Exercise (RAE), has become the central institution and ritual of British academic life. The Guardian newspaper likes to refer to it as a “contact sport” or “academics’ favourite blood sport.”⁷ The metaphor is slightly off: whereas sports have an element of excitement, the RAE is merely tedious bureaucracy. It was introduced in 1986 as part of the Thatcher government’s program to reform the public services along a market model. Further exercises took place in 1989, 1992, 1996, and 2001, and the next is currently in preparation for 2008. Academics submit a given number of publications (usually four) and the ‘quality’ of these is assessed by an audit team on the basis of factors such as the prestige ranking of the publisher or journal. In 2001, departments were rated on a scale of 1 to 5 (with an extra category of 5* at the top) depending on the proportion of staff entered for the exercise whose work qualified in terms as “nationally excellent” or, better, “internationally excellent.” The 2008 exercise will employ a similar scale of 1 to 4. While the RAE is supposed to measure quality not merely quantity of publication, and while there is a cap on the number of publications that each academic enters for the exercise, nevertheless one effect has been a culture of “more is better.” As one commentator put it, “Whether it actually improved research outcomes continues to be hotly debated. However it certainly expanded the volume of academic publication.”⁸

The RAE reflected Thatcher’s neoliberal faith in the market and the private sector as the one-best-model which public-sector institutions should copy. Introduction of the RAE came a year after the report of the Jarratt Committee, or the Steering Committee for Efficiency Studies in Universities, which strongly criticized universities’ style of management and argued for the imposition of a corporate strategic management model.⁹ Under Thatcher, those public institutions that could not expediently be privatized were to be restructured into “internal markets” (pseudo-markets) in which an element of market-imitating competition is introduced into the administrative arrangements. The rationale was that competition was required to overcome bureaucratic inertia and to break the spell of traditional practices that hindered efficiency. The reforms were dressed in the pervasive language of rolling back the state. In fact, as the RAE and other educational audits, such as the Quality Assurance Agency for Higher Education’s (QAA) teaching audit (TQA), demonstrate, pseudo-markets were accompanied by a massive expansion of intrusive bureaucracy and of the power of Whitehall in relation to the universities and have led to the creation and constant augmentation of the power of unaccountable quasi-governmental agencies or quangos.

Audit culture is a product of this drive toward marketization, but it is also itself an important vehicle for marketization and commodification.¹⁰ Audit so closely accompanies marketization because it is a technology of distrust.¹¹ Both the Thatcher and Blair governments have been deeply hostile to tradition and to the entrenched practices of British public life, including academic culture. This antipathy was evident in Thatcher’s conflict with elites, such as the civil service mandarins, whom she considered too wedded to the old Keynesian consensus. Remaking Britain in a free market, entrepreneurial spirit was to involve a cultural revolution. The radical nature of Thatcher’s programme was masked behind the rhetoric of recapturing the spirit of the

Victorians. New Labour's ideology is quite straightforwardly "out with the old, in with the new." And what is new, or in the language of New Labour, what is "modern," is identified as being that which is in the main trajectory of global free-market capitalism.

"Modernization" is the key ideological term of the New Labour government and it has the status of a categorical imperative. As in Clarke's disparagement of the notion of truth for its own sake as "medieval" and his assertion that universities are there to address the "rapid process of global change," innovation and constant change are presented as categorical imperatives. The notion of modernity, and the view of modernization as an imperative, is the defining core of New Labour's otherwise ideologically thin corpus. 'Modernization' has legitimized the neoliberal program of opening up all sectors to market competition.¹²

The antipathy to tradition has also more deeply entrenched and emotive aspects. Policy thinking about higher education in Britain has been dominated by attitudes toward Oxford and Cambridge. Thatcher's hostility to the Whitehall mandarins, as well as to the Oxbridge academic culture in which they were bred, was also class politics within the middle class, drawing on resentment felt by the lower-middle towards the upper-middle classes and on conflict between business and professional fractions of the middle-class. Soviet dissident and scholar Boris Kagarlitsky, in an incisive commentary on British politics, described Thatcher's rise to power as being propelled by a 'lumpen bourgeois' revolt against a Keynesian technocratic state in crisis:

Lumpen-bourgeois nationalism combined splendidly with the policies destroying traditional national institutions for the benefit of international capital. It is no coincidence that, in the mid-1980s, Thatcher's government found itself in successive conflicts first with Oxford University, then with the House of Lords, then with the Church of England and then with the Monarchy. It is difficult to suspect lords or bishops of Left radicalism, but their historical conservatism has proved to be incompatible with Mrs. Thatcher's anti-social right-wing radicalism.¹³

In her attack on the universities, Thatcher also appealed to the utilitarian, pragmatist, and anti-intellectual orientation of the British manufacturing elites and middle-classes. This orientation is mirrored paradoxically by the anti-intellectual valorization of 'common sense' by the British working-class (largely in response to the realities of class exclusion and symbolic violence in the education system). The image of the ivory-tower don became a convenient unifying scapegoat for the long-standing failings of British manufacturing industry, even though it was arguably British industrialists' "'real world' primitivism," i.e. hostility to theoretical knowledge, that was behind British manufacturing's failure to keep up with technological change and maintain competitiveness. Desmond Ryan in the *New Left Review* has argued that the imposition of manufacturing culture on the hitherto creative culture of the universities was "the moment when the potential cure of ailing Britain was given the disease."¹⁴ Charles Clarke's remarks about "medieval" learning exemplified New Labour's political uses of anti-intellectualism. In the public mind, academics stand as the last "leisure class" needing to be brought back into the "real" world of work and graft. The RAE appeals to

the populist idea that privileged intellectual elites should be made to show that they are doing work, providing value for money. The market rhetoric of students as educational consumers similarly appeals to egalitarian and populist distrust of elites and breaks down paternalistic relations.¹⁵

However, at the same time, marketization of higher education exacerbates inequalities among students (with fees leading to rising levels of personal debt) and reinforces hierarchies between institutions. Metric rankings have reinforced the idea that there are and should be a small number of elite research institutions, and have spurred elitist hopes of constructing a British 'ivy league.' 'Modernization' as marketization does not undermine class inequality, but rather intensifies it. Nevertheless, it does reflect a changing relationship between class power and governance in Britain. Political scientist Michael Moran has written of the change from 'club government' by a cohesive establishment to the new regulatory state which does not rely on the shared class mentality and social ties of a homogeneous ruling class.¹⁶

The audit culture reflects changes in the structure and orientation of the British elite and the state and in the mode of governmentality through which it operates. Ryan argues that audit reflects the emergence to power in Thatcherism, and continuing in New Labour, of a new professional-managerial political class, one which "seeks to rule Britain, where the old elite just governed it": "The [old] Establishment served as a gyrosopic force for continuity... The new elite is more like a Continental political class, those for whom politics is a career, rather than a natural outcome of eminence, ascribed or achieved. Since the mid-1980s, their control of legislation has been used not just to make laws but also to make, and to position, power.... The New Public Management is the new magistracy; audit is their new law."¹⁷

Audit provides a means for imposing governmentality and transforming culture by unsettling established practice, replacing established informal, tacit understandings of institutional goals with explicit (but often not well understood), centrally mandated targets, and by creating a climate of coercion and fear. Audit institutionalizes permanent anxiety, and this leads to permanent revolution in the quotidian practices of higher education institutions. Universities and academic departments constantly reform themselves as they strive to be fine-tuned RAE-beating machines. The result of this permanent revolution is that very few academic practices and procedures have any real legitimacy or feeling of solidity, permanence, or stability. Change begets change. New practices, imposed from above, lacking legitimacy, can be swept away even more easily than the old practices. The next set of procedures with which the last round of malfunctioning reforms were replaced are weaker still, and so on and so on. So it is with the RAE itself. As each version comes under fire and its weaknesses are exposed, it is subject to rewriting. This has not, however, led to the exercise becoming any less punitive and disruptive of academic life.

Since the 2001 exercise generated considerable discontent, the exercise has been reconfigured following recommendations by Sir Gareth Roberts, principal of Wolfson College, Oxford. The new version is supposed to discourage strategic "game-playing."

The Roberts Report stated that one reason for the review was that as higher educational institutions' "understanding of the system becomes more sophisticated, games-playing will undermine the exercise."¹⁸ This is indicative of the way in which audit generates strategic behavior: since the logic of audit is strategic, it is likely that the strategic behavior will only change form. At the time of writing this essay, academics are trying to predict what this latest incarnation will mean. In order to be prepared to meet whatever new targets are drawn up, changes in academic practice and institutional arrangements will need to take effect before the definition of the targets is announced. Dr. Peter Cotgreave, director of pressure group Save British Science asked: "How on earth are researchers supposed to plan for the future when they're playing a game and they don't even know what the rules are, because the umpire isn't going to decide on the rules until after the game has finished?" So uncertainty itself becomes the driving force in British academic life.¹⁹

The vacuum of tradition, or shared understanding, creates a vacuum of trust. Audit, a technology of surveillance which finds its justification in distrust, itself operates to destroy existing social bases of trust and to create the climate of distrust in which it thrives. Audit is in that sense self-reproducing and self-augmenting. This self-legitimizing quality of audit is linked to its effect in demoralizing the workforce and the institution. Academic unions frequently make the argument that audit (together with low pay) leads to demoralization—in the sense of lowered morale—of the academic workforce.²⁰ But it is clear that audit is geared towards achieving demoralization in a different, though related, sense: that of emptying social and institutional relations of their moral content.²¹ As audit replaces trust with surveillance and configures intellectual work in terms of purely instrumental goals of meeting targets, so it divests this work of moral meaning and empties academic activity of moral commitment. This is entirely analogous to the way in which the regime of the factory eliminates the possibility of pride in work associated with the values of craftsmanship, and so makes external control (Taylorist work-discipline) necessary for the regulation of production. Similarly, the RAE creates new problems of regulation, as it has given rise to strategic behavior by academic departments which threatens the legitimacy of the system. This kind of strategizing is an inevitable result of a system in which activity becomes oriented to meeting purely arbitrary demands rather than to inherent values.

As academic institutions become entirely oriented to external audit, the value accorded any particular academic activity comes to be entirely determined by the power of the sticks and carrots of the corresponding audit regime. The fact that the RAE is the overridingly powerful system of control in British universities (in comparison, for example, with the corresponding Teaching Quality Assessment [TQA]) has inevitably led to a decline in institutional and individual commitment by academics to teaching. For all the talk of students as "stakeholders," it is clear that the moral relationship between scholars and students has been undermined as audit draws academics into a one-dimensional relationship with the state. Further, despite all the governmental rhetoric about the need for closer cooperation of academia with industry, Roberts has acknowledged that the RAE sidelined applied research.²²

Hand-in-glove with the audit culture is the primacy of managerialism over collegiality in academic relationships.²³ Managerialism is both an ideology and a mode of relationship. As an ideology, it is a cult of leadership, exalting and aggrandizing the managerial role. It is an ideology fundamentally hostile to tradition in that it demands that the organization cannot go on as it always has but must have goals or targets to meet and must constantly update and advance these. As Geoffrey Alderman of the Academic Development and Assurance Unit of Middlesex University put it, “Audit is a powerful instrument of change, but it is not a measure of quality.” He goes on to note: “Now one does not have to be a very sophisticated student of public administration to realize that an agency which ‘monitors’ academic standards will not confine itself for very long to the mere reporting of facts. It will find it exceedingly difficult to restrain itself from commenting upon what it monitors, and then making proposals based upon those comments, and then suggesting sanctions if its proposals are not adopted.”²⁴ It is the task of the manager, then, to overcome the inertia of traditional practices and the resistance of those wedded to these practices so as to bring about far-reaching changes in organizational culture. Managerialism mandates permanent organizational revolution. Managerialism is thus becoming entrenched in British academic life as ideology but even more powerfully as a set of social relations. The recent trend has been towards appointing vice-chancellors and other senior university administrators from the managerial ranks of private industry, and these figures bring to university administration the mind-set and modes of organizing from their previous roles. But university leaders drawn from academic careers also now imbibe corporate-managerial culture and managerial understandings of efficiency as being achieved through rationalization and concentration.

The closure in 2002 of the Centre for Contemporary Cultural Studies by the University of Birmingham represented all of the most disturbing features of the new corporate-managerial culture. It demonstrated that the RAE operates as an instrument of managerial coercion, the quantitative score providing a pseudo-rational legitimacy to authoritarian management practices. The rationale for closing the Centre was that it scored unfavorably in the 2001 RAE. The established international reputation of the department mattered not, nor did the fact that the exercise has been widely acknowledged to be problematic for new disciplines and interdisciplinary programs. In Birmingham, as is the case more generally, behind the language of efficiency and “excellence” was an emphasis on managerial control.²⁵ The closure of the Centre has set an example beyond Birmingham, making clear to all that the shutting of even highly renowned departments is the ultimate sanction which can and will be used to deal with those academics not regarded as conforming with the management regime.²⁶

Managerialism exists not only at the level of administration. It is a culture which increasingly pervades relationships within departments and between academics, replacing traditional collegial mores. As the RAE introduces an artificial production cycle into academic work, the task-oriented work rhythms and routines arising from the individual scholar’s engagement in his or her subject and field now potentially clash with the external goals imposed on and by the institution.²⁷ Individual academics must now be disciplined into integrating their intellectual work with the overall strategy of the institution. As universities and departments operate according to corporate plans, so the

institution takes priority over individual creativity and collegiality gives way to corporate-bureaucratic line-organization.

What the RAE has accomplished above all is an inversion of the goals of intellectual activity. The measure has itself become the goal: a perfect realization of the critique of instrumental rationality of critical theorists such as Marcuse and Habermas. Far from being a neutral measure of academic activity, the RAE has become the determinant of that activity. Private individual motivations may vary, but in the official discourse the only legitimate goal is the pursuit of a high RAE score. Scholarly curiosity therefore becomes potentially a problem if it leads into research avenues that will not have a pay-off within this audit cycle. In this way, academic communication has been reoriented away from participation within the community of scholars. The RAE not only reifies and commodifies academic communication, but directs it away from the scholarly community towards the state. Articles in journals become merely displays to an agency of the state, an indicator to the powers that they are getting value for money.

What is most destructive is the extent to which the value of intellectual endeavor is now measured in monetary terms. The measure of money is now widely institutionalized in the use of so-called 'metrics' as the basis for audit and assessment.²⁸ Departments are judged by university managers on their ability to bring in research funding, and this is increasingly the key criterion on which departments judge individual academics; thus, academic research, whether funded by state agencies or private bodies, becomes indistinguishable from the contract research carried out by, say, a consulting firm. The fundamental goal is to get the contract; that is why the bid is made and the research conducted. The university becomes a storehouse of expertise which can be hired for a fee, whether by private industry or by state agencies.²⁹ The funding issue is often discussed in terms of "conflicts of interest," but the issue goes deeper than that. It concerns most fundamentally the goals and the moral foundations of the academic vocation.

The primacy of monetary standards in contemporary academic life indicates the delegitimization of the cultural and ideological repertoires of liberal humanism which had previously operated to define the university as a space both outside market economic relations and as having relative autonomy from the state. The rise of neoliberalism has substantially undercut and eroded these older liberal repertoires.

Capitalist Hegemony and the Decline of Liberal Humanism

It is paradoxical that the intellectual and cultural values associated with the pursuit of knowledge for its own sake were seen by mid-twentieth century liberal thinkers such as the chemist and philosopher Michael Polanyi as being dependent on the existence of an economic free market. Polanyi, an intellectual influence on the prophet of neo-liberalism Friedrich Hayek, was convinced of the close association between liberal cultural freedom and free-market capitalism. In mid-twentieth century liberal discourse, 'the market' and 'cultural values' were mutually supporting legitimacy discourses – the market was seen as the mainstay of liberal freedoms, but also the market had to be defended and legitimized in terms of liberal cultural values.³⁰ This stands in marked contrast with the contemporary situation in which the market has broken free from liberal-humanist

cultural repertoires so that purely economic market values stand by themselves and dominate all cultural values.

Michael Polanyi's philosophical project was directed against both the subordination of science to political ideology in the Soviet Union and the calls of British socialist scientists, such as J. D. Bernal, for the planning of science for social purposes. Polanyi took strong exception to Bernal's view of science as a force of production. To Polanyi, the idea of planning science for social goals was an attack on the idea of truth as an absolute value and a retreat from the Enlightenment. He also argued against planning by presenting a sociological portrait of the scientific community as an autonomous and self-regulating guild. Planning, he argued, would disrupt the collegial structure of science, replacing it with centralized control which would bind it to the state and to material and political ends. What is interesting is that the subordination of the ideal to the material that Polanyi regarded as exemplified in the Soviet Union is today clearly apparent in the universities of the western liberal democracies, driven by an orientation to global capitalism. Sovietization of intellectual production, with quotas and plans, is introduced by neoliberal governments and by university leaders as a way of reorienting the academy towards commodity production.³¹

Polanyi articulated a common assumption of liberal thinkers in the mid-twentieth century: scientific autonomy could thrive only under conditions of liberal democracy and a free market economy.³² Indeed, Polanyi drew an explicit parallel between the free market and the social order of science, both being examples of spontaneous ordering and coordination by an "invisible hand."³³ Such a connection between free inquiry and economic laissez faire has been commonly assumed in liberal thought.³⁴ It is significant, therefore, that today the assault on academic freedom is being led in the name of the free market.

The instrumentalization and commodification of academic knowledge is interwoven with broader economic, social, and cultural shifts resulting from the global hegemony of free-market capitalism. Jessop writes that "as capital searches for new sources of valorization, commodity relations can be extended into spheres not currently subject to the logic of accumulation. This process is seen in commodification of political, educational, health, scientific and many other activities, so that they come to be primarily and directly oriented to opportunities for profit." Indeed, this process is cheerfully described by its advocates, without mystification, as "capitalizing knowledge."³⁵ The far-reaching character of this program recalls Marx and Engels' observation that capitalism drowns all traditional values "in the icy water of egotistical calculation. It has resolved personal worth into exchange value, and in place of the numberless indefeasible chartered freedoms, has set up that single, unconscionable freedom—Free Trade."³⁶ As might be expected, this dominance of market relations over all others, and the introduction of the market into previously tradition-bound professional domains, has gained momentum in the years following the collapse of the Soviet Union and the eastern bloc. In the wake of the Cold War, the cultural values which liberal intellectuals associated with western capitalism, the legitimizing value of which perhaps introduced a degree of restraint, have

been cast as surplus to requirements. Such was the post-Cold War confidence in the global market as the ‘end of history.’

Zygmunt Bauman’s discussion of the rise and decline of the “legislator intellectual” is of crucial importance here. Bauman connects the value of “culture” to the role of intellectuals in legitimating the power of the early modern and modern nation state. The value of culture, the notion that to be fully human meant to be cultured or cultivated, was tied to the way in which the emergence of the modern state involved the replacement of traditional forms of solidarity with centralized social control. It was in this context of the rise of the nation state that Bauman locates the legislator intellectual. Intellectuals, as guardians of “culture,” played a crucial role in legitimizing these new forms of social control and political-cultural identity. Bauman writes: “The intellectual ideology of culture was launched as a militant, uncompromising and self-confident manifesto of universally binding principles of social organization and individual conduct.”³⁷ The legislator intellectual played a role in defining and asserting the superiority of the national culture, and thereby in legitimizing the power of the nation state. Bauman argues, however, that this role of the legislator intellectual has declined as national culture has been replaced by the market as the central ordering principle of modern societies. “More and more,” he argues, “the culture of consumer society was subordinated to the function of producing and reproducing skilful and eager consumers, rather than obedient and willing subjects to the state.”³⁸ In consumerism, normative regulation through the nation state is replaced with seduction through the market and the commodity spectacle.³⁹

In this context, intellectuals are no longer looked to as “legislators” of cultural values. Instead, they become “interpreters”: “from the perspective of the present-day intellectuals, culture does not appear as something to be ‘made’ or ‘remade’ as an object for practice; it is indeed a reality in its own right and beyond control, an object for study, something to be mastered only cognitively, as a meaning, and not practically, as a task.”⁴⁰ The task of creating culture has shifted from intellectuals to the media and other purveyors of mass entertainment and mass consumption. This context provides little rationale for the maintenance of the university apart from the market as a source of high-cultural values.⁴¹

However, Bauman’s analysis of the importance of the rise of consumer society needs to be supplemented with an account of the relationship of intellectuals to global politics. The legitimating function of the legislator intellectual was prolonged, even in the context of consumer capitalism, by the Cold War. Following World War Two, when the advanced capitalist societies were relatively secure from internal challenge due to the demise of classic working-class revolutionary movements, intellectuals continued to have a legitimating role in relation to the external ideological challenge posed by the Soviet Union and its satellite states, and by national liberation movements in the Third World. In the context of the Cold War, liberal intellectuals played a key ideological role in articulating a conception of the antagonism between East and West as a clash of values, and in defining what it was that the western liberal democracies were defending against

the ‘Soviet threat.’ Central to this defense was the notion of cultural autonomy and, above all, of the autonomy of science.

The Soviet Union’s claim to be a state founded on scientific principles, and its association of Communism with scientific and technological advance, were countered by western intellectuals, such as Polanyi, with the claim that science could flourish only in the free public sphere provided by liberal democracies. The ideological conflict of the Cold War was framed to a large extent around opposing claims of the two sides to represent scientific modernity. As Indian sociologist Shiv Visvanathan has written of post-war western liberal ideology: "By World War II, capitalism had lost its poetic power, and the free market lay as a desiccated myth. At this juncture, science took over as the sustaining force of the liberal imagination... [Karl] Popper and [Michael] Polanyi became the Adam Smiths of this new regime."⁴² In Popper’s *The Open Society and Its Enemies* (1945) and Polanyi’s *Science, Faith, and Society* (1946), we find the argument that science is naturally aligned with liberal democracy and that its professional values made science incompatible with totalitarianism.⁴³ It is notable that Polanyi became an important figure in the anti-Communist group of intellectuals, the Congress for Cultural Freedom, for example organizing its 1953 conference, held in Hamburg, on “Science and Freedom.”⁴⁴ The contrast between western cultural and scientific freedom and Soviet “totalitarianism” provided both British and American academics with a powerful language with which to maintain and defend their institutional autonomy.

At the same time, in the post-war period, university education was tied to Keynesian welfarist notions of meritocracy and equality of opportunity, as in the Robbins expansion of British higher education in the 1960s. The education system was seen to have a key role to play in what Jessop calls “the expansion of a mass welfare state based on national citizenship.” In that context, the legitimacy of higher educational institutions and practices could be defended by appeal to values other than purely economic ones. C. P. Snow’s defense of science in the “two cultures” was framed in the language of Keynesian consensus: emphasizing the importance of scientific progress in economic development, but also arguing that science exemplified egalitarianism and meritocratic values. Science was also tied to the Keynesian state in the Wilson government’s attempt to construct a classless technocratic “socialism” based on the “white heat of the scientific revolution.” In technocratic social democracy such as Wilson’s, scientific development was tied to the imperative of growth for the purpose of preserving the integrity of social order within the capitalist state and minimizing class conflict.⁴⁵ However, as Kagarlitsky notes, “in the end, the illusion appears that growth of gross national product is necessary in itself, is an objective in itself.”⁴⁶

Writing in the context of post-war Keynesianism, Habermas argued that the technocratic state in advanced capitalism regulates economy and society so as to “suspend” class conflict or render it “latent.” The image of scientific and technical neutrality assumed a powerful ideological function within the Keynesian technocratic state in depoliticizing state action and generating assent by the presentation of state policy as rational, efficient, and neutral. In that context, we can see that the state had an interest in preserving the apparent autonomy of science, because that autonomy was useful in the state’s

mobilization of science and technology as ideology.⁴⁷ So the image of scientific autonomy was important in the post-war period both as an element of Cold War liberal ideology and in the legitimating of Keynesian technocratic state interventionism.

Today, following the 1970s' crisis of the Keynesian consensus and the end of the Cold War, both the Cold War liberal and the technocratic justifications of the autonomy of science and intellect have declined. In Britain and America, the classical justification of capitalism by appeal to 'free-market' liberalism re-emerged. But a crucial difference is that the Schumpeterian conception of scientific and technological innovation as a key productive force is now added to the classical free-market. In the Schumpeterian competition state, science is conceived of as a force of production and its commodification and marketization is presented as the way to mobilize that force.⁴⁸ This fundamentally changes the position of the university and its intellectuals (both scientific and humanistic) in relation to the state and capitalism.

It is significant that contemporary anti-globalization protests are met with no other ideological response than that "there is no alternative" and the charge that the protestors are anti-scientific Luddites. The dominant ideology presents science, progress, and the market as inherently linked. Today, science legitimizes capitalism and the capitalist state not by presenting an image of liberal cultural autonomy against totalitarianism, not so much by providing an image of neutrality for technocratic state action, but, above all, by its integration with the market and by the link thereby drawn between technological progress and capitalist entrepreneurialism. The public's relationship with science is constructed not as citizens of democracy or the administrative welfare state, but as consumers of new technologies. Science becomes part of the apparatus for securing order not through normative control but through consumerist seduction.

In this climate, the university as an autonomous cultural institution located within civil society is facing a crisis of legitimacy. Its function and role are suddenly unclear and up for grabs. The only language available in which to formulate its role is that of the market. As academic science becomes valued chiefly for its marketable products, the notion of scientific freedom is today being reconfigured so as to map onto the free market. As academics are re-branded as techno-scientific global capitalists, working for pharmaceutical multinationals or establishing genomics and high-tech start-up companies, so their freedom becomes isomorphic with that of capitalism's financial elite: the free flow of venture capital.⁴⁹

The corporatization of university organization tends to reinforce the association of intellectual freedom with monetary exchange. The more restrictive and bureaucratic regular academic routines are made, the more that academics come to associate their professional freedom with escape enabled by money. Money becomes the key to scientific freedom within and beyond the academy. So, freedom within the academy is gained by being 'bought out' of teaching commitments, or freedom can take the form of escape from the academy into the world of industrial start-ups and venture capital. In this way, the notion of academic freedom as the communal autonomy of the "guild" is replaced with the values of the market. The association of "free inquiry" with the "free

market” is no longer merely an ideological claim of laissez-faire liberalism but a reflection of the very real relationship between money and scientific research.⁵⁰

The market ‘freedom’ of the entrepreneurial scientist masks the extent to which this researcher is no longer free to determine the social and intellectual goals of their research. Such marketized conditions are particularly negative for the social sciences and the humanities. As the university loses its autonomy in relation to the state and private industry, critical social scientific and humanistic inquiry into the foundations of social order and social values faces growing difficulty in justifying its role and maintaining its purpose. This is particularly the case as the “value” of research becomes equated with (and sometimes measured by) the cost of carrying it out and hence the possibility of attracting large-scale funding. The meaningfulness of social criticism is in any case effectively neutralized by the bureaucratization of academic production, as intellectual “output” ceases to be engagement in an intellectual public sphere, but becomes an indicator of productivity for productivity’s sake.

The audit culture, which strengthened its grip on British academic life through the 1990s and which continues to do so, is an aspect of the academic regime in a situation in which the values of the capitalist market have become detached from and are hostile to traditional liberal humanist values. Having previously defined themselves as the bastions of these liberal humanist values, the universities are now struggling to find new terms in which to legitimize their existence in a market-dominated world. Britain’s academic audit culture is just a particularly punitive version of the marketization of academic life, as capitalism severs its ties with liberal-humanism.

Alternatives

Alex Callinicos has recently noted that one effect of the corporatization of higher education has been the development of more militant trade unionism among academics. Whereas the Association of University Teachers for most of its history conceived of itself as a professional association rather than a union, that has changed in recent years and the merger in 2006 with NATFHE to form UCU (University and College Union) solidified a trade union identity in academic organizing. However, as Callinicos also notes in his account of the assessment boycott and wage campaign that coincided with UCU’s formation, that trade union consciousness also can be limiting. There was widespread dissatisfaction with the outcome of the wage campaign and the feeling that union officials had stopped action prematurely.⁵¹ I would add that British academic unionism has tended to contain dissent within the parameters of wage campaigns and has done little to address the transformation of working life within the universities.

There is a general passivity in the British academic community in the face of the radical transformation of academic life and the erosion of the liberal humanist academy.⁵² This passivity lies in the acceptance of marketization as a set of imperatives, a sense of the inevitability of reform, and a failure to imagine alternatives. On the one hand, there is a conservative critique which opposes audit from the perspective of the donnish past and which fails to critique marketization (seeing American fee-paying liberal arts college or

the Ivy League model as the solution).⁵³ On the other hand, a sense of the bankruptcy of tradition and the unstoppable of change permeates thought about higher education.⁵⁴ To defend humanist ideals, on this view, is to want to revert to a Never-Never Land of the “ivory tower.”

However, this passivity also stems from contradictions within liberal conceptions of academic freedom. There is a tension in liberalism between treating knowledge as a value in itself and valuing it in utilitarian terms. This tension is evident in Max Weber’s classic liberal defense of academic autonomy, in “Science as a Vocation.” Weber sought to defend the integrity of science against political interference. Yet, his account of the value of science was to a great extent utilitarian. Weber’s scientific ethos was an ethos of service. Science, on Weber’s account, could not provide grounds for making choices regarding ends or values. However, it could be useful in showing how to achieve a set of given ends.⁵⁵ Marcuse’s cogent criticism was that Weber’s conception of neutrality was self-defeating, making science into an instrument and adjunct to power: “Your ‘neutrality’ is as compulsory as it is illusory. For neutrality is only real where you have the power to repel interference: if you do not, you become the victim and assistant of any power that chooses to use you.”⁵⁶ This inadequacy of the liberal conception of scientific autonomy is implicated in the British academic community’s passive acquiescence in the audit culture. For British academics, the conception of science as an instrument has overridden the humanist value of knowledge for its own sake (which has lost ideological force). Thus they feel compelled to demonstrate their utility by acquiescing to the audit regime. In addition, precisely because liberalism has exalted the formal freedom of the market and conceptualized intellectual freedom on the model of market exchange, it does not provide adequate terms in which to develop a critical perspective on the subsumption and industrial disciplining of intellectual work which is a corollary of marketization. In addition, the liberal “negative” conception of freedom as the absence of interference provides an inadequate basis from which to critique the coercive undercurrents of market freedoms. The entrepreneurial scientist may consider him or herself free to pursue research unimpeded by bureaucratic restrictions; yet, that experienced freedom may mask the way in which the research trajectory is being shaped by the goals of corporate capitalism, goals which may be highly coercive on a structural level.⁵⁷ Liberal notions of freedom, like liberal notions of neutrality, may, as Marcuse argued, mask the way in which “you become the victim and assistant of any power that chooses to use you.”

There are some reasons for optimism that critical and liberatory conceptions of the intellectual role may emerge to challenge the neoliberal model. Globalized capitalism, though hegemonic, is not free from fundamental contradictions. And, as Jessop argues, as capital accumulation penetrates ever broader spheres of social life, so these contradictions proliferate and potentially become more intense.⁵⁸ The contradictions that emerge are often cultural as well as economic, or rather, are rooted in conflict between the lifeworld and the encroaching economic relations.⁵⁹ As the university is called on to carry out key economic functions within capitalism and as intellectual activity within the university is commodified and “capitalized,” so the university can be expected to become an increasingly important site in which the conflicts and contradictions of advanced

capitalism come to be expressed. This potential source of conflict is suggested by current tensions in the education function of the university.

New Labour's target of expanding higher education entry to 50% of school leavers is one that is motivated and justified by the notion that the "knowledge economy" demands a highly skilled, intellectually flexible workforce. However, it is becoming clear that middle-class expectations about what higher education can deliver are rising faster than the capacity of the economy to incorporate large numbers of graduates into positions commensurate with their desires and expectations. The promise of opportunity is increasingly frustrated by credential inflation and increasingly intense positional competition that accompanies the expansion of higher education. As sociologist Phillip Brown puts it, "as opportunities for education increase, they are proving harder to cash in." Brown argues that graduates are increasingly falling into an "opportunity trap"—the fading of the opportunities supposed to accompany education, as the economy fails to provide satisfying jobs for the larger and larger numbers of university leavers.⁶⁰ Graduates are often finding their expectations of elite status shattered as they are forced to take routine and unfulfilling jobs. Another aspect of this is the increasing exposure of educated, professional, high-status employees to risk in the "flexible" economy. The ideal of increased opportunity, so fundamental to the promise of Keynesian welfarism but also mobilized by neoliberal apologists for the global "knowledge" economy, is in fact facing a crisis as the economic risks associated with a global economy increasingly impinge on all sectors of society. These risks are difficult to obstruct through credentialing or other means. Brown argues:

The opportunity trap is not only a problem for individuals or families. It exposes an inherent tension, if not contradiction, in the relationship between capitalism and democracy. Opportunity, delivered through expanding education and social mobility, has kept the democratic dream of individual achievement and social justice alive throughout the twentieth century, at the same time as fulfilling the imperatives of economy growth. [However]...the legitimate foundations of opportunity, based on education, jobs and rewards, are unraveling.⁶¹

The university can be expected to become a focal point of this crisis of opportunity. This is particularly the case because in the university the economic dimensions of this crisis will intersect with the cultural dimensions.

In the face of credential inflation and the diminishing "cash value" of a university degree, the value of the students' educational investment could be defended by appeal to the traditional humanist defense of education, namely that it has an inherent value—knowledge is a good in and of itself. However, in the quest to transform the universities into corporate entrepreneurs in the "knowledge economy," we find politicians deriding these very humanist values and universities responding by framing their role in purely instrumental terms. This is a clear example of the way in which, as capital penetrates and commodifies ever wider spheres of social relations, so it erodes potential ideological and social resources for managing conflict and crisis. It seems likely that the diminishing commodity value of higher education will sensitize students to its diminishing human

value as universities are reorienting themselves away from liberal education towards commodity production and an increasingly anomic research culture. In the university, the divorce between commodity values and humanistic values is particularly clearly drawn.

The notion of educational opportunity encodes a range of expectations which capitalism cannot broadly fulfill. The desire for creative, self-directed work that is meaningful in human terms is still centrally involved in the moral and personal value attached to education. While education was confined to the ruling strata whose free decision-making power depended on the routine and unfree labor of the mass of the population, there was a high degree of symmetry between educational expectations and outcomes.⁶² Today, graduates entering the world of white-collar work find themselves increasingly powerless over their working lives and working conditions. The routinization of the formerly relatively free creative sphere of academic work illustrates this, as does the increasing insecurity of the academic profession with the large numbers of lecturers and researchers subject to temporary contracts and constant uncertainty.⁶³ These trends in academia follow the more general societal pattern of the extension and intensification of risk and uncertainty, implicated in the “opportunity trap” facing university graduates.⁶⁴ As it is progressively more difficult to find shelter from the risks of the global economy, so graduates also find it increasingly difficult to escape routine, coercively directed work. Yet the expansion of higher education carries with it ever broader demands and expectations for free, creative work. As this occurs, the fundamental contradiction between alienated labor and the human aspiration to free life-activity is implicated at all levels of the university: in research, in education, and in the transition from graduation to the labor market.

The expansion of higher education involves the implicit promise of the extension of human freedom, but this is a promise which enters into a basic conflict with corporate-managerial power. To the extent that critical thinking remains possible in the university, higher education emerges not only as a locus of contradiction, but also a zone in which these contradictions can be brought to consciousness. It is therefore potentially unstable terrain for managerial capitalism. Just as the university was the central locus for the crisis of Cold War culture and the explosion of the social and cultural contradictions of the Keynesian-Fordist state at the end of the 1960s, it may emerge as a key site in relation to the emerging contradictions of the current neo-liberal order.⁶⁵

Notes

1 Karl Marx and Frederick Engels, *Manifesto of the Communist Party* (Moscow: Progress Publishers, 1986), 37.

2 See also the excellent critique by Alex Callinicos, *Universities in a Neoliberal World* (London: Bookmarks, 2006).

3 Quoted in Jeevan Vasagar and Rebecca Smithers, ‘Is This Man a Waste of Public Money—Or Will He Have His Place in History?’, *The Guardian*, May 10, 2003, 3. See

also Gordon Graham, *The Institution of Intellectual Values* (Exeter: Imprint Academic, 2005), esp. 7-45.

4 Chancellor Robert C. Dynes, *State-of-the-Campus Address*, March 22, 2001, <http://www-chancellor.ucsd.edu/state.html>.

5 Bob Jessop, *The Future of the Capitalist State* (Cambridge: Polity Press, 2002), esp. 95-96, 108-109, 120-122, 163-168. Jessop writes (p. 120) that the economist “[Joseph] Schumpeter has a key role.. as an emblematic figure in shaping, directly or indirectly, the new understanding of competitiveness and linking it to the long waves of technological innovation and capital accumulation.”

6 Desmond Ryan, “The Thatcher Government’s Attack on Higher Education in Historical Perspective,” *New Left Review* 227 (January-February 1998), 3-32, quoting 30. On New Labour and neo-liberalism, see also John McMurty, *Value Wars: the Global Market Versus the Life Economy* (London: Pluto Press, 2002), 8-21; George Monbiot, *Captive State: the Corporate Takeover of Britain* (London: MacMillan, 2001); Deborah Lynn Steinberg and Richard Johnson eds., *Blairism and the War of Persuasion: Labour's Passive Revolution* (London: Lawrence and Wishart, 2004).

7 “Sorting Swans from Ducklings,” *The Guardian*, June 3, 2003
<http://education.guardian.co.uk/RAE/story/0%2C7348%2C968904%2C00.html>;
“It's in the Stars,” *The Guardian*, February 10, 2004,
<http://education.guardian.co.uk/RAE/story/0,7348,1144390,00.html>.

8 Marie Thorne and Rob Cuthbert, “Autonomy, Bureaucracy and Competition: the ABC of Control in Higher Education,” in Rob Cuthbert ed., *Working in Higher Education* (Buckingham: Society for Research into Higher Education (SRHE) and Open University Press, 1996), 170-193, on 187. The applicability of the tool of audit to 'measure' academic quality is highly questionable. For an insightful critique of the validity of audits to measure academic work, focusing on teaching, see Bruce Charlton, “Audit as a Tool of Public Policy: the Misuse of Quality Assurance Techniques in the UK University Expansion,” *European Political Science* 2 (2002): 24-35:
www.essex.ac.uk/ecpr/publications/eps/onlineissues/autumn2002/profession/auditing.htm.

9 Committee of Vice-Chancellors and Principals (1985) *Report of the Steering Committee for Efficiency Studies in Universities (The Jarratt Report)*. London: Committee of Vice-Chancellors and Principals; Brian Salter and Ted Tapper, “The Politics of Governance in Higher Education: the Case of Quality Assurance,” *Political Studies* 2000 48: 66-87, esp. 71-72.

10 David Harvie, “Alienation, Class and Enclosure in UK Universities,” *Capital and Class* 71 (Summer 2000), pp.103-132, on p.110.

11 Michael Power, *The Audit Society: Rituals of Verification* (Oxford: Oxford University Press, 1997); Theodore Porter, *Trust in Numbers: The Pursuit of Objectivity in Science and Public Life* (Princeton, NJ: Princeton University Press, 1996).

12 McMurty, *Value Wars*, 13; Alan Finlayson, *Making Sense of New Labour* (London: Lawrence and Wishart, 2003), esp. 66-97; Callinicos, *Universities in a Neoliberal World*.

13 Boris Kagarlitsky, *The Dialectic of Change* (London: Verso, 1990), 329-330, quoting 330.

14 Ryan, "The Thatcher Government's Attack on Higher Education," 8-26, quoting 26.

15 See also Graham, *The Institution of Intellectual Values*, 23-25.

16 Michael Moran, *The British Regulatory State: High Modernism and Hyper-Innovation* (Oxford: Oxford University Press, 2004).

17 Ryan, "The Thatcher Government's Attack on Higher Education in Historical Perspective," 32.

18 "Review of Research Assessment," Review by Sir Gareth Roberts to the UK Funding Bodies. Issued for Consultation, May 2003, <http://image.guardian.co.uk/sys-files/Guardian/documents/2003/05/29/report.pdf>, quoting 4; "Going metrics," *The Guardian* January 7, 2003, <http://education.guardian.co.uk/RAE/story/0,7348,869625,00.html>.

19 Quoted in "RAE overhaul to produce research 'premier league,'" *The Guardian* February 11, 2004, <http://education.guardian.co.uk/RAE/story/0,7348,1145160,00.html>.

20 The Association of University Teachers (AUT) and the National Association of Teachers in Further and Higher Education (NATFHE) merged in 2006 to form UCU, the University and College Union.

21 Ralph Fevre, *The Demoralization of Western Culture: Social Theory and the Dilemmas of Modern Living* (London: Continuum, 2000); Fevre, *The New Sociology of Economic Behaviour* (London: Sage, 2003).

22 "Going Metrics"; "Universities hit by research 'snobbery'" *The Guardian* June 8, 2004 <http://education.guardian.co.uk/RAE/story/0,7348,1234226,00.html>; Peter Knight "Selfish Assessment" *The Guardian* October 12, 2004, <http://education.guardian.co.uk/egweekly/story/0,,1324571,00.html>.

Strategic behavior by academics is mirrored in strategic behavior by students. The commodification of education and the culture of testing, which begins early at school, has led to a growing problem of plagiarism in higher education, a problem merely symptomatic of education as alienated labor.

23 Shore and Wright, "Audit Culture and Anthropology"; Geoffrey Alderman, "Audit, Assessment and Academic Autonomy," *Higher Education Quarterly* 50 (3) (July 1996), pp.178-192. See also A. H. Halsey, *The Decline of Donnish Dominion* (Oxford: Clarendon Press, 1992). On the gender dimension of the new managerialism, see Robyn Thomas and Annette Davies, "Gender and the New Public Management: Reconstituting Academic Subjectivities," *Gender, Work and Organization* 9 (4) (August 2002): 372-397.

24 Geoffrey Alderman "Audit, Assessment and Academic Autonomy," 185, 191.

25 "Birmingham's Cultural Studies Department Given the Chop," *The Guardian*, June 27, 2002, <http://education.guardian.co.uk/higher/socialsciences/story/0,9846,745058,00.html>; Chris Shore and Susan Wright, "Whose Accountability? Governmentality and the Auditing of Universities," *Parallax* 10 (2) (2004): 110-116, on 109, 113-114, esp. 114. One journalist writes: "Not that we should be conned into thinking that the Birmingham department was producing an insufficient amount of high quality research—anyone who has had a passing acquaintance with the RAE knows that success depends much more on the way in which a department dresses up its activities and presents its case in the submission than on how research active and intellectually fertile it actually is": "The Wrong Result," *The Guardian*, July 18, 200 July 18, 2002, <http://education.guardian.co.uk/higher/columnist/story/0,9826,756928,00.html>.

26 Whose University? A Day of Discussion and Workshops, Co-organized by Birmingham University Association of University Teachers (AUT), Birmingham University Guild of Students, and teachers and students of Cultural Studies and Sociology, May 10, 2003. See also "Birmingham's Cultural Studies Department Given the Chop,"; "Cultural Elite Expresses Opposition to Birmingham Closure," *The Guardian*, July 18, 2002, <http://education.guardian.co.uk/higher/socialsciences/story/0,9846,757441,00.html>.

27 Drawing on the distinction between 'task-orientation' and 'clock-orientation' in E. P. Thompson, "Time, Work-Discipline and Industrial Capitalism," *Past and Present* 38 (1967), pp.56-97. See also the discussion of information technology and the industrialization and de-skilling of academic labour in David F. Noble, *Digital Diploma Mills: The Automation of Higher Education* (New York: Monthly Review Press, 2001).

28 "Going Metrics"; Some critics of the RAE would like to see it replaced by purely 'metric' measures: "using research income as a surrogate measure creates a funding result that is virtually the same as the whole RAE": Eric Thomas, "RAE is No Longer Rational" *The Guardian*, January 7, 2003, <http://education.guardian.co.uk/egweekly/story/0,5500,869527,00.html>.

29 British universities are increasingly taking on a research and development function for industry. For implications, see, for example, John Crase, "Oil on Water: Academia May Be Compromised by its Links with the Oil Industry," *Guardian Higher Education* (February 25, 2003), p.1. See also Chris Langley, *Soldiers in the Laboratory: Military Involvement in Science and Technology—and Some Alternatives* (Scientists for Global Responsibility, 2005), esp. 20-21, 45-46.

30 Michael Polanyi, *The Logic of Liberty: Reflections and Rejoinders* (London: Routledge and Kegan Paul, 1951); Polanyi, *Personal Knowledge: Towards a Post-Critical Philosophy* (Chicago: University of Chicago Press, 1962).

31 Cf. Andrew Ryder, "Reform and UK Higher Education in the Enterprise Era," *Higher Education Quarterly* 50 (1) (January 1996), pp.54-70, esp. 62-66.

32 See also, for example, Robert K. Merton, "Science and the Social Order [1938]" in idem, *The Sociology of Science*, ed. Norman W. Storer (Chicago: University of Chicago Press, 1973), 254-266; Merton, "The Normative Structure of Science [1942]" in ibid., 267-278; David Hollinger, "The Defense of Democracy and Robert K. Merton's Formulation of the Scientific Ethos," in Hollinger, *Science, Jews, and Secular Culture: Studies in Mid-Twentieth-Century American Intellectual History* (Princeton, NJ: Princeton University Press, 1996), 80-96.

33 Michael Polanyi, 'The Republic of Science: Its Economic and Political Theory [1962]', in Marjorie Grene ed., *Knowing and Being: Essays by Michael Polanyi* (London: Routledge and Kegan Paul, 1969), pp.49-72, on p.52; Polanyi, *The Logic of Liberty*, 162-165. Polanyi's analogy was taken up enthusiastically by Friedrich A. Hayek. See Hayek, *The Constitution of Liberty* (London: Routledge and Kegan Paul, 1960), esp. 160; John Gray, *Hayek on Liberty* (London: Routledge [1984] 1998), 14-16, 133, 138.

34 David Hollinger, 'Free Enterprise and Free Inquiry: the Emergence of Laissez-Faire Communitarianism in the Ideology of Science in the United States', in idem, *Science, Jews, and Secular Culture*, 97-120, esp. 102-103.

35 Jessop, *The Future of the Capitalist State*, 29; Henry Etzkowitz, Andrew Webster, and Peter Healey eds., *Capitalizing Knowledge: New Intersections of Industry and Academia* (Albany: State University of New York Press, 1998).

36 Marx and Engels, *Manifesto of the Communist Party*, 36.

37 Zygmunt Bauman, "Legislators and Interpreters," in idem, *Intimations of Postmodernity* (London: Routledge, 1992), 1-25, on 11. See also Zygmunt Bauman, *Legislators and Interpreters: On Modernity and the Intellectuals* (Oxford: Polity Press, 1987).

38 Bauman, "Legislators and Interpreters," 17.

39 Zygmunt Bauman, *Freedom*, (Minneapolis, MN: University of Minnesota Press, 1988), 73; Henri Lefevre, "The Bureaucratic Society of Controlled Consumption," in idem, *Everyday Life in the Modern World* (London: Harper and Row, 1971), 68-109.

40 Bauman, "Legislators and Interpreters," 23.

41 Bauman has recently extended his analysis to the issue of audit and managerialism, with a somewhat different emphasis from my argument here: Zygmunt Bauman, "Culture and Management," *Parallax 10* (2) (2004): 63-72.

42 Shiv Visvanathan, "Atomic Physics: The Career of an Imagination," in Ashis Nandy ed., *Science, Hegemony and Violence: A Requiem for Modernity* (Delhi: Oxford University Press [1988] 1996), 113-166, on 113.

43 Karl Popper, *The Open Society and Its Enemies* (London: Routledge and Sons, 1945); Michael Polanyi, *Science, Faith and Society* (Chicago: University of Chicago Press, 1946).

44 Congress for Cultural Freedom, *Science and Freedom: Proceedings of a Conference Convened by the Congress for Cultural Freedom and held in Hamburg on July 23rd-26th, 1953* (Boston: Beacon Press, 1955). Frances Stonor Saunders, *Who Paid the Piper? The CIA and the Cultural Cold War* (London: Granta Books, 1999); Peter Coleman, *The Liberal Conspiracy: The Congress for Cultural Freedom and the Struggle for the Mind of Postwar Europe* (New York: Free Press, 1989); Giles Scott-Smith, *The Politics of Apolitical Culture: The Congress for Cultural Freedom, The CIA and Post-War American Hegemony* (London: Routledge, 2002).

45 Jessop, *The Future of the Capitalist State*, 163; Kagarlitsky, *The Dialectic of Change*, 74; Halsey, *The Decline of Donnish Dominion*. On Wilson and technocracy, see Kagarlitsky, *Dialectic of Change*, 85, 117.

46 Kagarlitsky, *The Dialectic of Change*, 74. For Wilson's 'white heat' speech being referred to in the context of a typical statement by a New Labour politician of the new Schumpeterian-competition model of 'entrepreneurial science,' see Patricia Hewitt, "Royal Society of Chemistry Speech," June 25, 2002, The Institute of Nanotechnology, <http://www.nano.org.uk/phrelease.htm>.

47 Jurgen Habermas, "Technology and Science as 'Ideology'" in idem, *Toward a Rational Society* (Boston: Beacon Press, 1970), 81-122, esp. 107-111. On the paradoxical relationship between scientific autonomy and the state's use of science, see also Chandra Mukerji, *A Fragile Power: Scientists and the State* (Princeton: Princeton University Press, 1989), esp. 190-203.

48 cf. Habermas' discussion of scientized technology and of science a force of production in "Technology and Science as 'Ideology'," 100, 104.

49 Martin Kenney, *Biotechnology: the University-Industrial Complex* (New Haven: Yale University Press, 1986); Paul Rabinow, *Making PCR* (Chicago: University of Chicago Press, 1996); Daniel Lee Kleinman and Steven P. Vallas, 'Science, Capitalism, and the Rise of the "Knowledge Worker": The Changing Structure of Knowledge Production in the United States', *Theory and Society* 30 (2001): 451-492.

50 See the relevant discussion in Lawrence C. Soley, *Leasing the Ivory Tower: The Corporate Takeover of Academia* (Boston, MA: Southend Press, 1995), esp. 39-54.

51 Callinicos, *Universities in a Neoliberal World*, 36-37.

52 On this passivity, see Paul Taylor, "Humboldt's Rift: Managerialism in Education and Complicit Intellectuals," *European Political Science* 3 (1) (Autumn, 2003), www.essex.ac.uk/ecpr/publications/eps/onlineissues/autumn2003/index.htm.

53 Robert Stevens, *From University to Uni: The Politics of Higher Education* (London: Politico's Publishing, 2004), and Graham, *The Institution of Intellectual Values*.

54 See for example the assertion that "Academics may not like it, but teaching has had to be transformed from a pre-Fordist artisan craft into a Fordist organized mass production operation" in John Dearlove, "The Academic Labour Process: From Collegiality and Professionalism to Managerialism and Proleterianisation," *Higher Education Review* 30 (1) (1997), pp.56-75, on p.68 (my emphasis).

55 Max Weber, "Science as a Vocation," in H. H. Gerth and C. Wright Mills eds., *From Max Weber: Essays in Sociology* (Oxford: Oxford University Press, 1956), pp. 129-156.

56 Herbert Marcuse, "Industrialisation and Capitalism," *New Left Review* 30 (March-April 1965), pp.3-17, on p.11 (emphasis in original).

57 Drawing on Isaiah Berlin's distinction between 'positive' and 'negative' freedom (without accepting his conclusions): Berlin, *Four Essays on Liberty* (Oxford: Oxford University Press, 1969). Steven Lukes' discussion of radical versus liberal conceptions of power is also relevant here: Lukes, *Power: A Radical View* (London: Macmillan, 1974).

58 Jessop, *The Future of the Capitalist State*, 103. See also relevant observations in Kagarlitsky, *The Dialectic of Change*, 99-103.

59 Jürgen Habermas, *The Theory of Communicative Action*, Volume 2, *Lifeworld and System: A Critique of Functionalist Reason* (Boston: Beacon Press, 1987), esp. 383-403; Habermas, *Legitimation Crisis* (London: Heinemann, 1976); Habermas "New Social Movements," *Telos* (1981), 49, 33-37.

60 Phillip Brown, "The Opportunity Trap: Education and Employability in a Global Economy," *European Educational Research Journal* 2 (1) (2003): 141-179, quoting 149-150.

61 Brown, "The Opportunity Trap," 143. See also Phillip Brown, Anthony Hesmith and Sara Williams, "Employability in a Knowledge-Driven Economy," Working Paper Series, Paper 26, School of Social Sciences, Cardiff University; Phillip Brown and Hugh Lauder, "Globalisation and the Knowledge Economy: Some Observations on Recent Trends in Employment, Education, and the Labour Market," Working Paper Series, Paper 43, School of Social Sciences, Cardiff University.

62 Samuel Bowles and Herbert Gintis, *Schooling in Capitalist America: Educational Reform and the Contradictions of Economic Life* (London: Routledge and Kegan Paul, 1976). On asymmetries of freedom, see Zygmunt Bauman, *Freedom*.

63 Stanley Aronowitz, "The Last Good Job in America," *Social Text* 15 (summer 1997): 93–108.

64 See also Barbara Ehrenreich, *Bait and Switch: The (Futile) Pursuit of the American Dream* (New York: Metropolitan Books, 2005).

65 See also Masao Miyoshi, "Sites of Resistance in the Global Economy," in Keith Ansell-Pearson, Benita Parry and Judith Squire eds., *Cultural Readings of Imperialism: Edward Said and the Gravity of History* (London: Lawrence and Wishart, 1997), 49-87; Masao Miyoshi, "'Globalization,' Culture and the University," in Miyoshi and Fredric Jameson eds., *Cultures of Globalization* (Durham: Duke University Press, 1998), 247-270.