# The Place of Culture in Organization Theory: Introducing the Morphogenetic Approach
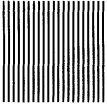
articles

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Abstract. As Allaire and Firsirotu (1984) pointed out over a decade ago, the concept of culture seemed to be sliding inexorably into a superficial explanatory pool that promised everything and nothing. However, since then, some sophisticated and interesting theoretical developments have prevented drowning in the pool of superficiality and hence theoretical redundancy. The purpose of this article is to build upon such theoretical developments and to introduce an approach that maintains that culture can be theorized in the same way as structure, possessing irreducible powers and properties that predispose organizational actors towards specific courses of action. The morphogenetic approach is the methodological complement of transcendental realism, providing explanatory leverage on the conditions that maintain for cultural change or stability. **Key words:** analytical dualism; culture; morphogenesis; structure
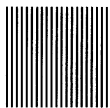
Indubitably, any newcomer to cultural analysis within organization theory confronts a bewildering array of competing conceptions grounded in divergent ontologies and their attendant epistemological orientations. Such bewilderment is certainly not helped by Grint's recent observation that '(c)ulture is rather like a black hole: the closer you get to it the less light is thrown upon the topic and the less chance you have of surviving the experience' (1995: 162). Grint's metaphorical usage of 'black hole' is due to the generic lack of consensus about (a) the nature of culture and (b) its amenability to managerial manipulation. The purpose of introducing the morphogenetic approach (Archer, 1979, 1982, 1988, 1995, 1996;

Buckley, 1967) is not only to navigate our cultural spaceship *away* from Grint's 'black hole' but to bring it safely and firmly back to earth; to an earth inhabited by real agents actively maintaining and modifying real socio-cultural phenomena. Fundamentally, managerial panaceas for achieving and sustaining a 'strong culture' for the purposes of competitive advantage are not the concern of the morphogenetic approach. Instead, we are concerned with *theorizing* the conditions that maintain for cultural stability or change. The issue of the managerial imposition of ideas on organizational members is therefore one for investigation at the interface between culture and agency, of which the outcome cannot be determined a priori.

Many would initially welcome the deliberate avoidance of Grint's 'black hole', but such a welcome would be a cautious one at best. In fact, caution would eventually give way to outright rejection. Such likely caution and eventual rejection are readily attributable to the generic fear of reification that would be taken to vitiate the morphogenetic approach's corpus of methodological propositions. The more charitable would maintain that such methodological propositions are of no utility *in practice*, as it would be countered that the very intertwinement of culture and agency precludes the specific modes of theoretical abstraction from concrete social reality that the morphogenetic approach enjoins. Specifically, whilst it might be conceded that culture and agency do constitute distinctive strata of social reality, any disengagement of their emergent powers and properties in order to examine their relative interplay over time would entail an unfortunate submission to the tyranny of abstraction, inflicting unwarranted violence on everyday *lived* organizational reality. Indeed, analytical dualism—the morphogenetic approach's methodological device—would be immediately construed as prima facie evidence for an overly 'objectivist' approach to organizational life: an ineluctable focus on culture qua disconnected object precisely because of its dualist methodological charter. Thus to Martin:

> ... cultures do not exist only in the realm of ideas and values; they constitute a specific material condition of existence that some consider oppressive and exploitative. It is misleading to portray cultures in organisations as arcane, ungrounded worlds of ideas and values, disconnected from the practicalities of earning a paycheck. (1992: 42)

In a similar vein, Dahlström maintains that one cannot separate culture from the social as an independent system, since 'ideas and beliefs are parts of material existence and of people's everyday life ... Culture is a driving force behind social change' (1982: 143). Finally, Meek (1988) argues that culture is something that an organization 'is', not as something an organization 'has' (see also Bate, 1994; Collins, 1998; Meyerson and Martin, 1987). Yet, to elide the material, ideational and agential aspects of lived organizational reality is to relinquish analysis of their relative interplay—how, for instance, arguments surrounding corporate strategy
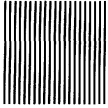
develop, remain unaltered or indeed change. As Brown (1995) rightly notes, the notion of organization qua culture necessarily foregoes a causal analysis of those properties which are contingent to its structural configuration.[1] The laudable yet misplaced fear of reification has led many to assume that the only alternative is elision. However, Meek concludes that:

> ... it seems necessary for the purposes of the interpretation of actors' behaviour that a conceptual distinction be made between 'culture' and 'structure'. It must be kept in mind, though, that both culture and structure are abstractions, and have use only in relation to the interpretation of observed concrete behaviour. (1988: 470)

Logically, Meek cannot simultaneously maintain that an organization *is* a culture and insist upon the necessity of a conceptual distinction between culture and structure.[2] The morphogenetic approach concurs that culture and structure ultimately derive from concrete behaviour. But it insists upon the transcendental claim that such abstractions refer to *real* relatively enduring phenomena that are ontologically distinct from the human agency that created them. Moreover, not only are they ontologically distinct, they possess sui generis causal powers,[3] of which the relative interplay is teased out sequentially via the methodological device of analytical dualism. Again, many would be quick to pounce upon the word 'dualism', hastily by-passing the prefix 'analytical'. Yet, without the latter, the morphogenetic approach simply implodes, since we are not dealing with Cartesian dualism, that is, with disconnected entities like Descartes' mind and body. Culture and agency are not 'ungrounded worlds', as Martin would put it: they are necessarily intertwined in organizational life but nonetheless can be analysed *dualistically* because of their distinctive irreducible causal properties (and their sequencing of mutual influence over time).

Indeed, the aim of the morphogenetic approach is precisely to theorize what Dahlström termed culture's 'driving force'. The 'driving force' of culture is only operative *through* human agency and is never hydraulic in nature but ever conditioning. Without human agency constituting the sole efficient cause, we end up in Martin's reified world. However, the morphogenetic approach is not concerned simply with upholding the truism that ideas are causally influential vis-à-vis organizational configurations and vice versa. Its rigour inheres in its ability to pinpoint the conditions that maintain for cultural stability or change—in the conjunction between culture and socio-cultural interaction and how such interaction is itself rooted in the structural domain.

The Morphogenetic Approach: Origins and Development

General Systems Theory

The morphogenetic approach has its origins in general systems theory; specifically, in the growing disenchantment with the untenability of
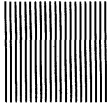
organic, mechanical and simple cybernetic systems theories that were so readily transposed to the social sphere. The term 'morphogenesis'[4] was first coined by Buckley (1967) in order to avoid the misleading connotations attaching to such concepts as 'self-regulation', which entail a concomitant overemphasis on the internal system at the expense of situational and environmental factors. The development of morphogenesis was aimed at incorporating the often overlooked fact that social systems are *human* constitutions; they are *open* and thus can never be modelled on any organic or mechanical systems analogue. Indeed, the morphogenetic approach, unlike its analogical predecessors, is concerned not only with:

> ... the *causes* acting on the phenomena under study, the possible consequences of the phenomena, and the possible mutual interactions of some of these factors, but also [with] ... the *total emergent processes* as a function of possible positive and/or negative *feedbacks* mediated by the *selective decisions* or 'choices' of the individuals and groups directly or indirectly involved. (Buckley, 1967: 80, original italics)

Agency is properly conceptualized as possessing 'degrees of freedom, selectivity ... *mediating* between external influences and overt behaviour' (Buckley, 1967: 95, my italics). That social forms are *mediated* by agency signals the morphogenetic approach's caesura from its reifying precursors. It is precisely the structured distribution of resources and power that enables Buckley to theorize agency in terms of its *degrees* of freedom (simply compare Tony Blair and the *Big Issue* seller). Social systems qua agential products are held to *react back* to condition differentially agential activity in the form of negative and/or positive feedback loops. These feedback loops are not reified mechanistic entities that somehow operate above-and-beyond agency. *They reside in the irreducible emergent properties (relational properties between organizations) that constitute any social system at any given time.* The latter provide structured reasons which work upon the vested interests of those differently positioned, thus predisposing various agents towards maintaining a particular organizational structure or changing it. Agential activity is held to post-date the anterior structural configuration which exerts a conditional influence upon it. Thus morphogenetic processes are quintessentially *sequential*, dealing in endless three-part cycles of Structural Conditioning → Social Interaction → Structural Elaboration.

Social and System Integration: Developing Lockwood's Distinction

Archer (1979) utilized and extended this sequential approach to structural change via Lockwood's (1964)[5] seminal distinction between 'social' and 'system' integration in her *Social Origins of Educational Systems*. Lockwood's principal concern was to reject the methodological individualism of conflict theory and to explain why low social integration per se (high level of conflict among groups of actors) is not a sufficient basis on
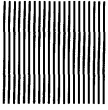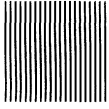
which to account for social change: it had to be complemented by an analysis of *system* integration. The problem for Lockwood was that conflict may be both endemic and intense in a social system without causing any basic structural change. Conflict theory would have to answer that this is decided by the variable factors affecting the power balance between groups. He maintained that this was inadequate by itself and needed to be complemented by the system integration focus. In short, social integration refers to the orderly or conflictual relations between actors; system integration refers to the orderly or conflictual relations between the parts of any social system. Therefore system integration could be low but, unless its contradictions were seized upon and amplified by sectional social groups, they could be contained and stasis would persist because of high social integration. Alternatively, low social integration could be profound without leading to any significant change unless it was linked to systemic contradictions. Thus it was the conjunction between the two states of affairs that accounted for structural morphogenesis or morphostasis.

Lockwood found it ironic that conflict theorists arrived at their respective positions through a generalization of Marx since it was Marx who differentiated social and system integration:

> The propensity to class antagonism (social integration aspect) is generally a function of the character of production relationships ... But the dynamics of class antagonisms are clearly related to the progressively growing 'contradiction' of the economic system. One might almost say that the 'conflict' which in Marxian theory is decisive for change is not the *power* conflict arising from the relationships in the productive system, but the *system* conflict arising from 'contradictions' between 'property institutions' and the 'forces of production'. (Lockwood, 1964: 250–1, original italics)

Indeed, the actualization of the contradiction between the forces and relations of production is contingent and not a teleological necessity. The actualization and amplification of the systemic incompatibility is dependent upon the extent to which those with prior structured vested interests are able to resolve versus realize the functional incompatibility (or 'strain'). The various historical and contemporary strategies of containment and compromise need not detain us. The importance of Lockwood's distinction between system and social integration (or between the 'parts' and the 'people') lies in the increase in explanatory power gained by analysing the variable combinations between the two rather than unhelpfully reducing explanation to social integration alone—or alternatively to states of the system alone.

However, Lockwood's distinction remained ontologically ungrounded and lacking in methodological specification (Archer, 1995: 172). The morphogenetic approach supplies both the ontological grounding and the methodological specification of the processes involved in the variable combinations between the two irreducible aspects of lived social reality. Its ontological grounding draws upon recent developments in social real-

ism. In particular, the transcendental realist claim that societies are irre-ducible to people, the *pre-existence* of which 'establishes their *autonomy* as possible objects of [social] scientific investigation and that their *causal* power establishes their *reality*' (Bhaskar, 1989: 25, original italics).[6] The 'possible objects' of society which are causally influential vis-a-vis agency, yet which would not exist without the continuous activity of the latter, reside in the enduring internal and necessary social relations that constitute organizational forms and the relations between them. The pos-itions within organizations are filled by actors whose subsequent behav-iour is structured by virtue of the network of social relations in that they become ineluctably embroiled. Lockwood's ontologically ungrounded systemic 'component elements' have their referents in the irreducible relations between organizational forms, which are themselves emergent properties. This needs to be unpacked since it underpins the methodological charter of analytical dualism without which the morpho-genetic approach founders.

A structural emergent property arises through the combination of necessary internal social relations (employer–employee; lecturer–stu-dent; doctor–patient) and possesses sui generis causal properties solely in virtue of these internal social relations. Such causal efficacy is attributa-ble to the modification of individuals' powers qua individuals. Thus an employee can neither formally sack his/her employer nor self-award a pay-rise; ultimately, any immediate or long-term breach of contractual arrangements (de jure or otherwise) results in dismissal. The importance of this truism must not be underestimated for it underscores the *stratified* nature of social reality, constituted inter alia by the irreducible strata of structure and agency respectively. Of course, the internal and necessary relations between employer and employee (or senior manager–line man-ager; cleaning supervisor–cleaner) do not exist in splendid isolation. Any organization is composed of a network of internal social relations, of which some will be symmetrically or asymmetrically related.[7] In sum, this embodies Meek's succinct observation that organizations 'cannot be reduced to the individual' (1988: 467) since we are dealing with an *emer-gent stratum of social reality which is ever dependent upon, but irre-ducible to, human agency*. The positions of senior manager and line manager have to exist before they can be occupied by actors (however short the time gap between the construction and subsequent occupation of the positions). They are thus *prior* to any subsequent activity, whereas role modification or extension necessarily post-dates such activity. Any form of structural morphogenesis then entails a different action-context for its incumbent(s), the objective reality of which is captured by the fact that social practices are qualitatively different (e.g. changes in pay differ-entials change employee relations: a takeover transforms company relations). It must be recalled that it is precisely the temporal priority of the 'component elements' (social structure) that led Lockwood rightly to maintain that his distinction is not a heuristic artifice 'because of the time
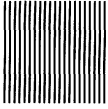
elements involved' (1964: 250) and the causal efficacy pertaining to both sides of the distinction.

Indeed, the dualist (methodological) identification of structure independent of its incumbents is due to the fact that structure and agency (system and social integration) are not coextensive. It is because 'structure and agency are phased over different tracts of time [that we are able] to formulate practical social theories in terms of the former being prior to the latter, having autonomy from it and exerting a casual influence upon it' (Archer, 1996: 694). Thus the three-part sequential schema delineated above can be readily employed to theorize the change, development or demise of any organized structural form(s). For example, any substantive study of the 'Next Steps' initiative[8] designed to effect changes in the civil service requires a historical analysis of the structure *before* the Sir Robin Ibbs' initiative (structural conditioning), what happened (social interaction) and the subsequent outcome (elaboration or stasis). As Brooks and Bate (1994) found in their study, structured vested interests, backed up ideationally, conditioned limited structural morphogenesis. More important, however, is the fact that their case-study demonstrates the theoretical indispensability of analytical dualism. Here, an identification of Lockwood's 'component elements' (civil service qua differentiated system), independent of actors' understanding, provides explanatory leverage inter alia on those issues surrounding agential *mis*calculation. The obstructions experienced by organizational actors may be the result of 'contradictions' (systemic incompatibilities) and thus are not necessarily matters of full agential 'discursive penetration'.

Structural Conditioning: Situational Logic and Strategic Guidance[9]

The systemic incompatibility (or 'strain') that causally conditioned agential activity in Brooks and Bate's case-study are *second-order emergent relational properties between organizations*; that is, between the newly created civil service agency and Whitehall. They are 'second order' emergent properties because they are themselves (irreducibly) emergent from the emergent structural configurations of the agency and Whitehall. In this case-study, the systemic incompatibility or 'strain' is an internally necessary one since the civil service agency could not exist without Whitehall and vice versa. It is conceptualized as a 'strain' because agents' situations were being moulded by operational obstructions imposed by Whitehall, which translated into practical problems that had to be dealt with 'on the ground'. The objective nature of the institutional incompatibility is independent of the (often partial or incorrect) accounts that are given for its existence (e.g. 'Treasury mentality' or 'Government hypocrisy'). The fact that agency in this instance did not respond like robotic executors of pre-programmed (Whitehall) scripts attests to its reflective ability to mediate emergent structural properties in creative and fundamentally non-deterministic ways. Here, the morphogenetic approach adds greater precision to the manner in which situations are
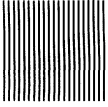
shaped for the agents involved. Specifically, it draws attention to the 'situational logics' of structural configurations that predispose agents towards specific courses of action. Such configurations shape action-contexts for agency at the same time providing *directional guidance.*

Thus the situational logic of a systemic incompatibility predisposes agency towards compromise and concession. Despite evident reluctance, the actors nevertheless engaged in some form of action *as a direct result of the systemic 'strain' generated by Whitehall.* Counterfactually, of course, no action (or unsubstantial restructuring) might have ensued, with agency simply circumventing the positive feed-back loop set in train by the 'Next Steps' initiative. Yet this might have invoked a hefty structured price. Indeed, in deciding completely to 'drag their feet', the key agents in Brooks and Bate's case-study might have misread the situation to such an extent that the systemic fault-line created by Whitehall might have been fully actualized and amplified resulting in blanket dismissal with the agency duly sold off to an independent (that is, non-governmental) organization. That this was not a foregone conclusion and as such might have been weighed correctly by agency simply attests to the *open* nature of any social system. In other words, any lack of concession or compromise does not necessarily signal end time for agency precisely because the emergent potentiality inherent in any systemic incompatibility may remain unexercised because of an array of contingent factors which act as countervailing forces (e.g. unforeseen substantial increase in civil service union bargaining power buttressed by powerful interest-groups located elsewhere).

In short, the fact that the key players in the case-study paid collective lip-service to the changes required by the 'Next Steps' initiative does not necessarily lead to an expunction of the systemic 'strain'. Whilst human agency here rightly reasoned that Whitehall would not sell off the agency, any continuing Whitehall commitment means that the systemic potentiality for actualization may resurface at any moment, depending inter alia on their relative degrees of bargaining power. Furthermore, it is not being suggested that the organization is an undifferentiated collection of agents uniformly united against the systemic tentacles of Whitehall. Indeed, the systemic incompatibility (incongruence of extant structural role array) opens up possibilities for agents *within* the organization to further their own vested interests, either by actively lending unequivocal approbation to senior management against Whitehall or by exploiting senior management's (potentially lethal) heel-dragging by enlisting outside sponsorship (be it Whitehall or their own trades union). In fact, any latent incompatibilities within the organization itself may now be exploited to full effect. Finally, the morphogenetic approach insists that as structures are remoulded human agency is itself simultaneously reshaped in the process. Such reshaping is evidenced by regrouping or union restructuring. (This underscores the fact that structural conditioning is not something that is 'done' to an ever-compliant agential mediator.)
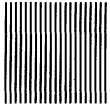
Contra Structuration Theory

Theorizing the response of a specific civil service department to systemic 'strain' entails analytically separating the 'parts' from the 'people' precisely in order to examine their relative interplay. The methodological device for this is therefore *analytical* dualism, which again is only workable because the 'parts' are sui generis emergent properties and temporally prior to social interaction, of which structural morphogenesis post-dates such interaction. As Porpora puts it, social relations 'do have independent causal properties and, moreover, that such relationships, once established, are *analytically prior* to the subsequent rule-following behaviour of actors' (1989: 206, my italics). To maintain a firm grip on structural dynamics means that we must not therefore confine our substantive analysis to the middle element of the morphogenetic approach's three-part sequential schema. To restrict ourselves solely to *current* interaction leads to tempting but ultimately futile sociological dead-ends. An instructive example is Giddens' (1979, 1984) structuration theory. The development of the morphogenetic approach is explicitly counterposed to Giddens' structuration theory in order to highlight the primacy which the former gives to ontological rigour against structuration theory's ontological (and methodological) dilution. Central to Giddens' enterprise is his notion of the 'duality of structure', encapsulated in the proposition that structure is both the medium *and* the outcome of human interaction. Whilst Giddens laudably aims to eschew any form of reification in his reconceptualization of structure and agency (which he contends obtains in any dualistic approach to social reality), his duality-of-structure stratagem logically entails a *denial* of pre-existence, entailing a vicious circularity for structure is *ever* the medium *and* the outcome, never a pre-existent given with which agency starts at T^1 and either elaborates upon or reproduces at T^3.

Not only does structuration theory ontologically enjoin that structure and agency are coterminous (thereby precluding any examination of their relative interplay), it also concomitantly denies structure and agency sui generis powers. Thus we end up with an ontologically depthless account of social reality confined to the middle element of the analytical sequence (which Archer thus terms 'central conflation'), the methodological consequences of which only permit the utilization of what Giddens calls 'sensitizing devices'. The withholding of sui generis causal properties from structure and agency is a necessary concomitant of the duality of structure for the simple reason that the temporal compression of structure and agency means that Giddens cannot avoid unhelpfully reducing structure to 'rules and resources'. But, as Thompson (1989) rightly points out, rules and resources are only part of the sociological story—they *presuppose* a structural context for their enactment and differential distribution respectively. Rules are not followed in a social void nor are they created ex nihilo. They are necessarily enacted *within* a context of irreducible social relations. How else can we employ such concepts as organization
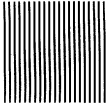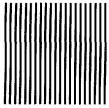
since it does not make any sense qua concept without the referents of irreducible social relations the existence of which are ever activity-dependent? It must be recalled that rule-following is logically subsequent to anterior emergent social relations. This in no way nullifies the quintessentially activity-dependent nature of all organized social forms. It simply specifies the sequential nature in which social forms *react back* to condition their human makers.

To suggest that Marks & Spencer checkout assistants turn up at work every day in order to engage in rigid or flexible rule-enactment is to remove the ontological rug from under the transcendental claim that they do so because they *have to sell their labour-power in exchange for money*. The capacity of Marks & Spencer to extract surplus value from its employees cannot be construed in terms of rules and resources, as the ability to set wages is not rule-governed but derivable from unequal power relations the existence of which cannot be attributed to prior rule-governed distribution.[10] That cleaners, managers, checkout assistants, lecturers, lawyers, etc. regularly turn up at their respective places of work begs the question of why rules are followed, why some are flexible and why some are intrinsically more amenable to change than others. To reply at this juncture that rules per se have the determinate capacity to direct human behaviour is either untenably to bypass their structural context or to confuse structure with culture. Indeed, normative rules do have causal efficacy yet such norms are often *about*, rather than constitutive of, social structure. Any rule-following, rule-changing or rule-expunging is logically subsequent to the anterior structural context in which they are embedded. Thus Giddens *has* to truncate the traditional concept of social structure in order to ensure consistency in his temporal compression of structure and agency, at best confining analysis to contemporary social interaction.

To reiterate, social realism presupposes a *relational* social ontology. Jane or Paul do not take money from customers which they subsequently place into the till solely *as* Jane or Paul. They do so as checkout assistants whose rules of conduct are grounded in, and derive their generative powers from, irreducible social relations. Structuration theory necessarily precludes an unpacking of the reasons why Jane and Paul qua positioned actors cannot change the rules governing their daily activities because it conflates the 'parts' and the 'people', which has led one commentator to underscore its essential *ir*relevance to methodology (Gregson, 1989). Furthermore, it is part and parcel of the commitment to the temporal compression of structure and agency that structure is deemed 'virtual' until 'instantiated' by human agency. This is simply another way of denying the pre-existence of social structure and definitionally confines analysis to the present tense (to instantiate means literally to represent by an instance at a current instant). Organizational actors do not, however, go about their day-to-day business creating the very (structural) basis of their intentional actions: they either reproduce or transform it, which presup-
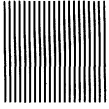
poses its prior existence. Yet this is what 'instantiation' refuses to accept. The problem with the concept of 'instantiation' is its implicit suspension of temporality. Of course, it is only by suspending time that Giddens can talk of structure as inherently transformable at any point in time—never something bequeathed to agency qua an irreducible web of social relations—but always amenable to those present here and now.

Theorizing Culture from the Morphogenetic Approach

Discussion of culture has been deliberately postponed until now because the generic propositions vis-a-vis social structure elaborated above are held directly to parallel the cultural realm. The substantive difference between the structural and cultural realms pertains to their constituents: namely, the cultural realm is composed of emergent relations pertaining between *ideas* (or more strictly propositions)[11] and their role in agential transactions. In short, the morphogenetic approach argues that a parallel distinction can be made between 'cultural system integration' and 'socio-cultural integration'—between the 'parts' and the 'people'. We are thus dealing with *three* sets of interrelated dynamics, that is, those operating *in and between* structure, culture and agency, the interplay of which is captured sequentially via analytical dualism.

Transcendentally, it is the pre-existence, autonomy and relative durability of culture which establish its ontological warrant as an irreducible entity, which predates socio-cultural interaction of which any cultural morphogenesis post-dates such activity. As with structure, this provides the temporal basis for distinguishing analytically between the 'parts' and the 'people'. To reiterate, culture (and structure) and agency are intertwined in reality and the morphogenetic approach simply disentangles those properties which, by their very nature, provide explanatory leverage on such lived reality because of their causal sui generis nature. In other words, disentangling the complex relative interplay of culture (or structure) and agency does not entail a concomitant proscription of methodological attention to real actors and their interpretations. Both logically and in practice, agential meanings and doings are (temporally) distinct from their anchorage in irreducible structural and cultural emergent properties. Those who wish to misconstrue the morphogenetic approach as unavoidably 'objectivist' focus on the first part of the morphogenetic cycle, namely, the identification of cultural (or structural) properties independent of agency. Yet the whole point of this is to examine how the cultural context is shaped for actors in order to gain explanatory leverage upon what they subsequently do in it or what they can do about it.

Thus the so-called interpretivist (or 'subjectivist') paradigm constitutes a classic case of those 'qui veulent avoir le beurre et l'argent du beurre': they want to have their ontological cake and epistemologically eat it. At its extreme, such an approach reduces social reality to language (e.g. Kamoche, 1995). Organizations are held to be mere 'objectifications',

having their locus of existence only in the minds of actors. In short, the interpretivist paradigm is another variant along the central conflationist (structurationist) theme. It denies the pre-existence of irreducible socio-cultural forms, thereby removing the very basis of its epistemological claims, for agential interpretations are interpretations of something independent. Indeed, without the transcendental necessity of irreducible structural and cultural emergent properties, the interpretivist paradigm cannot account for *mis*interpretation and moreover why actors are manipulated, misdirected or deceived. Many capacities for manipulation derive not from capricious inter-subjective machinations but from irreducible social relations that are relatively independent of the actors whose activity is conditioned by them. *The ineluctable end-result of interpretivism is hyper-voluntarism, since the primacy of epistemology means reality is what we make of it.* To reiterate, this is not simply assertoric, since interpretations and meanings must be anchored ontologically. In reducing organizational reality to subjective meanings, interpretivism commits the epistemic fallacy, namely the fallacy that statements about being can be reduced to our statements of knowledge about being.

Culture: Establishing its 'World Three' Status

The morphogenetic approach holds culture to be more or less coterminous with Popper's (1979) notion of 'World Three'. Popper distinguishes 'Three Worlds': 'World One' refers to *physical* states and processes; 'World Two' refers to *mental* states and processes; and 'World Three' refers to the *products* of human minds. Such products range from sculptures and paintings to Shakespeare's plays. However, Popper is concerned more with *objective knowledge*, namely, hypotheses, theories, arguments, ideologies, unsolved problems. The morphogenetic approach distinguishes the cultural system (CS), as that inherited sub-set of (cultural) items to which the law of contradiction can be applied at any given time. These items are therefore propositions because only those statements which make a claim to truth or falsity can be deemed to be in contradiction or consistent with one another.

The cultural system is objective and has autonomous relations among its components (theories, beliefs, values, arguments, or more strictly between propositional formulations of them). Its objective nature[12] is due to the fact that its components are 'totally independent of anybody's claim to know; it is also independent of anybody's belief, or disposition to assent; or to assert or to act. Knowledge in the objective sense is *knowledge without a knower*: it is *knowledge without a knowing subject*' (Popper, 1979: 109, original italics). Thus any contradictions or complementarities between its components are not dependent upon us. The cultural system would not, of course, exist without its human makers. However, this does not nullify its autonomy, even though we constantly act upon it and are acted upon by it: 'it is autonomous in spite of the fact that it is our product and that it has a strong feed-back effect upon us;
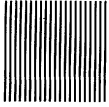
that is, upon us *qua* inmates of the second and even of the first world' (p. 112).

The cultural system (CS) is referred to metaphorically as the 'Library' because of the indubitable fact that vast tracts of it are written down in books, journals, pamphlets, statutes and so on. This is not to suggest that organizational actors pop out every five minutes to their local library in order to be able to act at all. On the contrary, it simply affirms the impossibility of the human mind(s) being able to store everything that has been said, debated, theorized, mooted, conjectured, discovered, etc.[13] Of course, some 'World Three' properties *have* to reside in our heads since otherwise organizational life would not be possible, namely, language (yet even here we do not store the totality, or we would never consult a dictionary). However, everyday recourse to government-supplied statistics, productivity charts, appraisal reports, newspapers, employment law texts, accountancy texts and various types of aide-memoire establishes the objective nature of the CS (and 'World Three') at any given time. Even those (propositional) properties which have their locus of existence in the human mind are nevertheless irreducible and may stand in a contradictory or complementary relationship to other CS denizens independently of the actor's cognizance.[14] Furthermore, it is not being argued that knowledge in toto is coextensive with the CS. 'Know-how' is fundamental to organizational life. Such knowledge is tacit (or quasi-propositional)—it is understood but rarely described. Obvious savoir-faire practices include making a cup of coffee, operating a till to using a word-processor. Competitive advantage is held by some commentators (e.g. Nonaka, 1996) to be founded upon the ability of companies to create new forms of knowledge and translate this knowledge into innovative action. It is maintained that successful companies will combine explicit and tacit knowledge. I do not wish to enter this particular debate. The salient point is that tacit knowledge constitutes a distinct sui generis stratum of (embodied) reality, whose propositional elaboration is a contingent matter. The focus on either 'know-how' or 'know-that' and the relative interplay with structure and agency depends on what one wants to explain.

Athey argues that experience of teaching, for example, is a necessary but insufficient condition for professional advancement, since 'there is a great deal of difference between "know-how" and consciousness of "know-why"' (1990: 31). Following Volpe (1981), she argues that an ideal teacher is one who:

> ... combines practical 'know-how' with the conceptual understanding which can only come from study and reflection. There are indications that, in spite of the politically-motivated, anti-theoretical *Zeitgeist* of the present time, many teachers of young children wish to evolve from intuitive knowledge towards a more articulate system of professional understandings. (Athey, 1990: 31)

For Bruce, teaching, to some extent, 'has to be an act of intuition embedded in educational principles [CS properties]. The teacher has to have
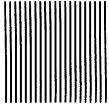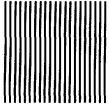
confidence in offering and organising the prepared lesson. It is an act of intuition because there is not much tangible feedback from these internal processes, especially with children from three to five' (1997: 50). Such intuition is conceptually underpinned, which in turn is subject to immanent revision or modification. Bruce acknowledges the 100-year difficulty of articulating the conceptual framework of know-how practices and argues that '(t)hose who can speak and write effectively and clearly about their work, as well as put it into practice, are more likely to be listened to' (p. 66). The focus on the conceptual underpinning of teaching practice is equally as important as the practice itself and their mutual intertwinement. The reason for focusing on its conceptual (CS) foundations stems from the Government-led attack on them, which culminated in the managerialist Education Acts of the late 1980s and early 1990s. To return to the above example of word-processing, simply documenting how people are (un)able to use packages with speed and efficiency and the tacit knowledge involved or how the latter cope with Repetitive Strain Injury (RSI) is not the bailiwick of organization theory.

What *is* of interest to organization theory is the interplay of material (structured) interests and their ideational back-up or opposition. In other words, how companies deal with complaints (internal or otherwise) of RSI sufferers and the ideas used either to play-down the seriousness of RSI or justify recourse to the Law. However, the use of ideas in powerplay is not without its costs or benefits. As Popper argued, 'World Three' has a strong feed-back effect upon us. Already we can spot similarities between structure and culture since structure reacts back to condition its human makers. The morphogenetic approach provides the methodological specification of the feed-back mechanisms in the form of costs/benefits that result from the use of ideas which shape action-contexts for their users because of their embroilment in specific logical relations. But this is to jump ahead. In establishing the parallel with Lockwood, the CS is analysed in terms of its *logical consistency*, that is, the degree of consistency between the component parts of culture. Such components are 'World Three' inhabitants, or cultural emergent properties. What agency does with such properties is conceptualized in terms of *causal consensus*, that is, the degree of cultural uniformity produced by the imposition of ideas by one set of people on another via legitimation, manipulation, persuasion, argument, etc. Thus the issue of power becomes marked.

However, in parallel with Lockwood, we can talk about the variable degrees of 'cultural system integration' and 'socio-cultural integration' for the two are not co-variant. In short, the former refers to the emergent relations between the (propositional) components of culture (the degree of *logical* consistency); the latter to relationships between people (the extent of *causal* cohesion). Cultural morphogenesis is thus theorized on the same sequential basis as structure: Cultural Conditioning → Socio-Cultural Interaction → Cultural Elaboration. The methodological employ-

ment of logic (the law of non-contradiction) to delineate the two non-coextensive facets of reality does not concomitantly entail that organizational actors are mere clones of Mr Spock. To insist that organizational actors ever live logically would be grossly to distort social reality and indeed to rob us of that which makes us human, rather than robot-like, beings. In contradistinction, the 'human personality can harbor fairly great incompatibilities in ideas, beliefs, attitudes, and ideologies, while operating quite effectively' (Buckley, 1967: 16). Therefore, those critics who arraign the morphogenetic approach on the charge of an implicit cognitivism and/or rationalism (see Nellhaus, 1998; Shilling, 1997) confuse the contradictions and complementarities that obtain amongst CS components at any given time with what *people* do with them.

Jang and Chung's (1997) case-study of a corporate renewal initiative in Korea exemplifies the reality of a generic *lack* of awareness of systemic contradiction: here between Confucianism and western discourses (Taylorism, management disciplines). Jang and Chung interviewed approximately 70 of Samsung's middle managers in order to ascertain the extent of awareness of the contradiction between New Management principles and Confucianism:

> In these interviews we found that most of the managers are not conscious of whether the stated principles of New Management are contradictory. After the contradictions were pointed out, however, most seemed to agree reluctantly with the argument ... In conclusion, Korean workers are not conscious of this contradiction in everyday life, which may produce a considerable amount of confusion for westerners. (p. 66)

The assumption of 'Western' confusion is attributable to the untenable proposition that East Asian 'logic' asserts that a thing can be both X and non-X (p. 59). Yet how can I be in the process of writing this article and simultaneously not be writing this article? Jang and Chung maintain that Koreans do not take seriously 'the Western-style logic of syllogism (e.g., the role of contradiction), *at least when they consider management discourses and practices*. Furthermore, Koreans feel comfortable in the co-existence of A and non-A in the same place' (p. 61, my italics). If there is not a universal law of contradiction, how could Jang and Chung conceivably engage in any form of conversation with their interviewees? How, indeed, could they point out the (logical) contradiction between Confucianism and western management discourse which their 70 or so interviewees 'reluctantly' understood? It is instructive that Jang and Chung note that the role of contradiction is not contravened with impunity beyond management practices. Unfortunately, they elevate the generic lack of agential cognizance of contradiction to a fundamentally (alien) logical axiom that somehow guides organizational activity. They seem to be confusing the subsequent toleration of contradiction with its impossible simultaneous invocation and revocation.

Nevertheless, their case-study testifies to the importance of ideational
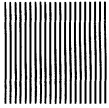
aspects of organizational behaviour. What would have been of particular interest is if some of Samsung's more ambitious younger members had been cognizant of the contradiction and whether the systemic fault-line was then exploited in order to advance their own vested interests. Indeed, Confucianism provided ideological legitimation for older members of the organization to remain within the hierarchy; western-style discourse, on the other hand, viewed this as a potential obstacle to profitability and entrepreneurship. In this case-study, it simply would not have been in the younger members' interests to exploit the systemic fault-line because structurally the cards were stacked against them. However, any down-turn in the Korean economy or internal restructuring would provide, ceteris paribus, the younger members with objective reasons for so doing. In the latter scenario, the hierarchy's defence of its vested interests may result in ideational change in the form of some redefinition to legitimate their interests that are structurally rendered vulnerable. In Jang and Chung's case-study, we witness socio-cultural (S-C) orderliness and cultural system (CS) disorderliness. Therefore CS disorderliness may remain unactualized because of structural factors. Indeed, as will be discussed, whilst cultural morphogenesis may be at the mercy between the conjunction of the two levels, the CS itself nevertheless has properties and powers irreducible to, and relatively independent of, social structure.

Unsticking the Glue

It should be clear from the foregoing that the cultural system is not a tightly-knit web of logical complementarities that provides an inherently 'stabilizing force' (Schein, 1992b) enabling any dysfunctional organization to get back on track. Not only did Buckley acknowledge that actors can harbour contradictions in their daily activities, he also argued that 'so can and do socio-cultural systems embrace wide diversities and incompatibilities while remaining amazingly persistent over long periods' (1967: 16). A major flaw that characterizes a significant number of cultural texts within the organization field is the a priori assumption that, on the contrary, culture is that which we all share or hold in common, thereby ensuring social cohesion and solidarity. Anthony exemplifies this position: 'The development of culture is a process natural to and inseparable from the development of communities, in which people come to *share values and beliefs ... Communities are cultures*' (1994: 50, my italics). To Hampden-Turner, the investigation of 'corporate cultures' involves looking at how people behave and discovering the glue that holds together the corporation: 'culture gives continuity and identity to the group ... The values within a culture are ... harmonious' (1990: 21). And, to Schein, culture is simply stability and normality and cannot exist unless there is a group that 'owns' it. Culture is held to be embedded in groups—it cannot be determined unless there is a definable set of people with a shared history (1992a: 241; see also 1992b, 1996).

Notwithstanding the conflation of the CS/S-C distinction, the generic a
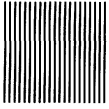
priori assumption is empirically refutable. In fact, Schein, like Parsons, readily accepts the reality of systemic incompatibility and S-C disorderliness but swiftly denies any theoretical significance deriving from the latter, assuming that a cognitive drive for order and consistency in the brain will ensure that human groups will gradually learn sets of compatible ideas. However, in *Organizational Culture and Leadership*, he documents high levels of confrontation and fighting within and between groups:

> To reach a decision and to get 'buy in', you must convince others of the validity of your idea and be able to defend it against every conceivable argument. This causes the high levels of confrontation and fighting that I observed in groups, but once an idea has stood up to this level of debate and survived, it can then be moved forward and implemented because everyone is now convinced that it is the right thing to do. (1992b: 34)

If culture is shared, its components consistently interwoven, then how does Schein account for the high levels of protracted ideational debate? Logically, Schein's approach *precludes* cultural morphogenesis (Collins, 1998). Such inconsistency derives from culture's anthropological heritage, specifically, the empirical findings which document a high degree of S-C orderliness over long periods of time. The generic assumption was transmuted into an unalterable methodological axiom, which later reached its apogee in the Parsonian central-value system. In fact, the CS itself was never viewed as conditioning the S-C level as a result of its own *internal* dynamics. In sum, Schein should not confuse a counter-factual (utopian) conception of culture with its current systemic configuration, which *is* characterized by logical consistency and contradiction. Thus to Meek:

> Organizations are often arenas for dispute and conflict, and one of the main items under dispute is often values . . . Cultural conflict is most obvious in professional organizations—large teaching hospitals, research laboratories, tertiary education institutions. (1988: 461)[15]

Cultural Conditioning: Situational Logic and Strategic Guidance[16]

Our methodological interest here is with those contradictions or complementarities which, for whatever reasons, people uphold. And, as Schein rightly noted, not all systemic items are relevant to any given issue the organization may be facing (1992b: 148). Explaining the action-context shaped by upholding an incompatible marketing proposition does not, for example, entail reference to sexist ideology since the latter is logically unrelated to it, although it may be contingently linked. Morphogenetic analysis proceeds sequentially by firstly examining the relational properties of the systemic items of interest to the organizational researcher; secondly, explaining the consequences for people of holding specific theories or beliefs; and, thirdly, delineating any cultural morphogenesis. Thus, like structure, culture has emergent relational properties (of logical
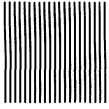
contradiction or complementarity) that *react back* to condition their makers. But they only do so when invoked by agency. Indeed, morphogenetic analysis of the Samsung case-study would primarily focus on the agential invocation of systemic items which mould action-contexts for their invokers. However, in the Samsung case-study, middle-managers were unaware of a specific CS contradiction, yet even a general awareness, as discussed, may nevertheless have not 'moved' agents for reasons residing in the structural realm.

When agents are 'moved' because of the relational properties that obtain between specific CS items, the morphogenetic approach provides explanatory leverage on the mechanisms of constraint or facilitation that condition cultural action and morphogenesis. To reiterate, none of this occurs within a structural vacuum. Necessarily, recourse will have to be made to the structural realm (relative distribution of power; availability of resources), yet cultural dynamics are not only irreducible to the latter; they may be out of synchrony with the latter, thereby confronting organizational actors with a *third-order* emergent relational property of constraint or enablement which derives from their incongruence or congruence. However, in maintaining the parallel with Lockwood, an example of cultural 'strain' will now be elucidated.

The Situational Logic of a 'Constraining Contradiction'

The necessary, yet contradictory (or incompatible), dependence of the relations of production on the forces of production predisposes agential concession or compromise in order to prevent actualization and amplification of the systemic fault-line. Clearly, the very nature of this internally necessary relation threatens its durability. The structural contradiction between the forces and relations of production represents an obstruction for certain institutional operations and these translate into problem-ridden situations for those involved. The problem here is not so much resolved as contained via various well-known safety-nets (unemployment benefit; bonuses; trade-union recognition; personnel managers ...). Similarly, this incompatibility has its counterpart in the cultural realm, theorized as a 'constraining contradiction'. A contradiction between A and B is an irreducible property of the CS and only exerts a conditional influence upon agency (the S-C level) if any actor(s) wish to uphold it. In brief, those who uphold A also unavoidably invoke B and with it the logical contradiction between them. This *necessary* connection is due to the dependence of A on B: without B it cannot work and indeed is only operable in terms of it. At the same time, B constitutes a threat to A because it simultaneously conflicts with it.

The systemic constraint or 'strain' derives from the necessary dependence of A upon B, for agency cannot simply repudiate B, yet, if B is fully actualized, then it threatens to render A untenable. Therefore, the situational logic dictates that for those who wish non-dogmatically to uphold A then, since direct resolution is logically impossible, *corrective* repairs
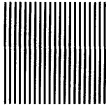
must be undertaken. Archer (1988) gives the two examples of the development of Christian beliefs and the advancement of scientific theories:

> Both are cases of birth into a hostile ideational environment, with which they had to cope if they were to survive but which constituted an unending threat to their survival. To claim that both surface(d) in inhospitable surroundings is not like saying they had the misfortune of bad 'home backgrounds' ... for without their respective environments we simply cannot conceive of them at all. Thus Christianity had to tangle with Antiquity because it emerged enmeshed in it, just as scientific propositions have to tackle observational data because the (f)act of stating a hypothesis entangles it in them. The key feature shared by these disparate instances of constraining contradictions is that both are concerned with relationships between *ideas* (with a belief in relation to other beliefs, with a theory in relation to other theories). (pp. 149–50, original italics)

However, the development of Christian beliefs will be of little interest to organization theorists who are in the main more concerned with contemporary issues. Therefore, instead of documenting the situational logic of correction in which Christianity became embroiled, two exemplars will be provided. Briefly, the situational logic generated by the 'constraining contradiction' generically results in the sinking of differences to achieve unification. Such ideational syncretism can follow three paths:

1 A ← B, that is, correcting B so that it becomes consistent with A;
2 A ↔ B, that is, correcting both A and B so they become mutually consistent;
3 A → B, that is, correcting A so that it becomes consistent with B.

Clearly, of course, for proponents of A, path (1) is the preferred option. Any corrective repairs in order to 'stick' at the socio-cultural level must gel with the extant distribution of vested interests. One can take the development of sex hormones as an apposite example of the conditional influence of a 'constraining contradiction'. Here, scientists working in different organizations partly funded by business were engaged in theorizing the body at the same time as producing hormone-based products for sale. The development of endocrinology during the 1920s and 1930s neatly highlights the dynamic interplay of sexist propositions (CS level) and agency (S-C level). At the beginning of the 20th century, sex endocrinology was characterized by two different approaches, namely, the biological and the chemical. Both disciplines were (and are) concerned with theorizing the generative properties of the body. Thus, when both disciplines are accentuated simultaneously vis-a-vis the same referent, each must *necessarily* contend with the theoretical propositions of the other. However, in the early years, the study of sex hormones was dominated by the biological approach: namely by physiologists, gynaecologists, anatomists and zoologists. Importantly, such scientific endeavours were affected by pre-scientific ideas (CS level) about masculinity and femininity. Indeed, the idea of testes and ovaries as agents of masculinity

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and femininity was paradigmatic in underpinning all scientific activity vis-a-vis the body.

The concept of hormones as substances playing a regulatory role in physical processes in organisms had a considerable impact upon physiology. The chemical messengers believed to originate from the gonads (sex glands) were designated sex hormones, with male sex hormones designating the secretion of the testes and female hormones designating ovarian secretion. It was suggested at the time that the key had been found to understanding what made a man a man and a woman a woman. Oudshoorn (1994: 19) notes that gynaecologists were especially attracted to the concept of female sex hormones since it seemed to promise a better understanding of, and thus greater control over, the disorders in their female patients. The immutable dualism of men versus women which permeated work on hormones between 1905 and 1920 fitted with with, and was buttressed by, ideological propositions about women's 'biological destiny'. Indeed, the ostensible antagonism between sex-specific hormones was invariably compared with the relationship between men and women.

However, as the field of endocrinology became more specialized, the dualism which underpinned all research was seriously challenged, to the extent that the biologists, in their unremitting commitment to dualist ideology, were confronted with the determinate effects of a constraining contradiction. The challenge came from the biochemists. Only very briefly could the biologists ignore the biochemists' counter-theoretical formulations which were firmly grounded in the cumulative evidence. Such evidence indubitably showed the presence of hormones in *both* sexes. Given that the biologists remained firmly wedded to sexist dualism, it is hardly surprising that they were compelled to look for other theories to account for such 'anomalies'. Indeed, scientists started looking for:

> ... a plausible theory to explain the source and identity of these 'heterosexual' hormones ... In the 1930s, different hypotheses were proposed to explain the presence of female sex hormones in male organisms ... *scientists tried hard to maintain the dualistic conceptualization of sex* ... In 1929 [it was] suggested that female sex hormones were not produced by the male body itself, *but that they originated from food* ... Despite criticism, the food hypotheses remained popular. (Oudshoorn, 1994: 27, my italics)

Whilst conveniently they did not publish reports explaining the presence of male sex hormones in females with regard to food-intake, the situational logic of a constraining contradiction meant that the search continued (correcting A so that it becomes consistent with B), ultimately leading to a conceptual shift. Female sex hormones were no longer conceptualized as restricted to female organisms and this applied equally to males. It did not take long for the concept of an exclusively sex-specific function of sex hormones to be reconsidered. Here, again, exponents of
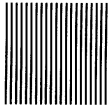
dualist theorizing suggested that female sex hormones in all probability had no function in the male body because of a low concentration. Indeed, it was postulated that female sex hormones caused sexual and psychological disorders! However, by the turn of the next decade, 'heterosexual hormones' were taken as axiomatic. Yet, whilst biochemists in turn preferred to prefix female/male hormones with 'so-called', in the end suggesting a complete abandonment, biologists did exactly the opposite. Instead, a more specialized terminology was developed, namely oestrogen and testosterone. Thus, on the one hand, sexual specificity was abandoned whilst, on the other, related terminology was not: 'From the 1930s until recently, the names male and female sex hormones have been kept in current use ... *In this respect the biological perspective overrules the chemical perspective*' (Oudshoorn, 1994: 36, my italics).

Yet, it is not so much that the biological perspective overrules the biochemical one, for the dualist biological propositions (theory A) were corrected somewhat in order to be consistent with the compelling arguments for 'heterosexual hormones' (theory B). Given the evidential force adduced by proponents of B, the proponents of A were confronted with a situational logic that led, inter alia, to ad hoc reformulations designed to rescue dualism. Ultimately, of course, dualism per se lost out, although a residue of such dualism remained in the form of mere labels. The constraining contradiction resulted in various syncretic shifts of one-sided correction.

But what about those organizations that are quintessentially *un*related to the study and manufacture of scientific-based products? Indeed, sympathetic sceptics, whilst accepting the above delineation of the fate of the biologists as exemplary of a constraining contradiction within the scientific field, may nevertheless need convincing about its applicability in contemporary contexts of concrete organizational reality. Thus reference will now be made to recent ethnographic work carried out in two junior schools.[17] A nine-month period of research was conducted to assess the ways in which staff mediate the systemic incompatibility between child-centred philosophy and the (implicit) philosophy of SATs (Standard Assessment Tasks).[18] Child-centred philosophy has its origins in Rousseau. The ideas contained within Rousseau's *Emile* (1762) have been developed notably by Pestallozi (1894), Dewey (1897/1974, 1900) and Kilpatrick (1916, 1918). At the core of their respective contributions to systematization is the view that education should reflect the nature of the child; that childhood is not a defective version of adulthood; and that what is to be learned should be determined by an understanding of the child's intrinsic nature at each stage of his or her development.

In underscoring the 'World Three' nature of child-centred philosophy, Darling (1994: 2) notes that in Britain the influence of these thinkers 'beyond the world of ideas was for a long time very limited'. Initially, constraining (or competitive) contradictions may be concealed by a variety of socio-cultural 'containment strategies' and the temporal extent of their

success is a matter of socio-cultural contingency. Thus when *Emile* was published it was burnt on the streets of Paris. In the above case-study it is conceivable that initial containment strategies might have involved the decision not to publish in the relevant journals and/or the debarment of biochemists from academic posts undertaken by sympathetic heads of faculty. However, the influence of child-centred philosophy can be traced to its official recognition in the Hadow Report (Consultative Committee, Board of Education, 1931) on Primary Education. Yet it was not until the establishment of the Teachers' Training Colleges, legitimated and buttressed by the Plowden Report (CACE, 1967), that the requisite fertile soil for its practical implementation was provided. It was recognized that a class is not a homogenous entity of Durkheim's indeterminate material but a heterogeneous collection of individuals who are not all the same and who therefore work at different learning speeds which require careful observation.

Unlike the pre-war conditions that acted as negative (morphostatic) feed-backs loops precluding fruition of child-centred philosophy, the post-war period of full employment inter alia provided the socio-cultural context that was required. The Plowden Report underscored the benefits to be had from the study of the ways in which children grow and endorsed an approach to primary education which focuses on children qua children rather than on some long-distance end-report (Darling, 1994):

> ... activity and experience, both physical and mental, are often the best means of gaining knowledge and acquiring facts. This is more generally recognised today but still needs to be said. We would certainly not wish to undervalue knowledge and facts, but facts are best retained when they are used and understood, when right attitudes to learning are created, when children learn to learn. Instruction in many primary schools continues to bewilder children because it outruns their experience. (CACE, 1967: 195)

Furthermore, the Plowden Report expressed palpable dissatisfaction with a subject-based curriculum: '... knowledge does not fall into neatly separate compartments ... [and] children's learning does not fit into subject categories' (p. 203). For reasons of brevity, the socio-economic conditions that have subsequently shaped the counter-reaction will not be dissected. Suffice it to say that child-centred philosophy now has its antithesis embodied in the National Curriculum and SATs examinations.[19] The philosophical critique by educational philosophers is exemplary of the syncretic repair work engendered by the unleashing of a 'constraining contradiction' undertaken by Peters (1958, 1963, 1964, 1967, 1969), Hirst and Peters (1970), Hearst (1974) and Dearden (1968, 1969, 1975, 1976) during the 1960s and 1970s. The salient point here is that the latter are constrained to deal with child-centred philosophy in order to advance their defence inter alia of a subject-based curriculum, not because they wish to juxtapose what they believe to be an irrefutable critique but because, in the
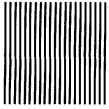
very process of providing their critique, they ineluctably invoke child-centred philosophy which simultaneously threatens to undermine it. The various illogical ruses developed by Peters et al. have been nicely documented by Darling (1994). However, each author could not function without the metaphysical claims vis-a-vis children. Indeed, Peters (logically) could not escape enmeshment in child-centred philosophy:

> It was understandable about forty years ago that reformers should proclaim that 'education is growth' or that children should be encouraged to learn from experience; *for there was a great deal wrong, both morally and psychologically.* (1969: 1, my italics)

We should thus not be at all surprised that Peters and his colleagues swiftly proceed to relegate this acknowledged importance to the historical dustbin—a mere fad that has since been supplanted. The logic of the constraining contradiction enjoins that proponents of anti-child-centred thinking must not invoke its hostile ideational environment *in its entirety*, yet cannot avoid invoking some aspects of it—hence the acknowledgement of the psychological and moral merits of child-centred philosophy and its simultaneous relegation to that of historical fad. Logically, of course, the indubitable importance of the psychological aspects of child development cannot be acknowledged and simultaneously dismissed. *Any test or public examination presupposes the very basis on which people learn in order that they perform well in it.* My own research attests to the syncretic work that has to be undertaken if agents wish to uphold non-dogmatically two dependent yet contradictory CS properties 'on the ground'. In both schools, the majority of staff were palpably cognizant of the contradiction between the child-centred philosophy that underpinned their daily work and the thrust of the (implicit) SATs philosophy.[20]

For these teachers, the Government-led imposition of the National Curriculum and yearly SATs constitute a stringent obstruction to what they hold primary teaching to be about. Yes, they accept the need for a structured framework but one within which child-centred philosophy could be enacted, subject of course to the contextual limits provided by the number of children and limited resources. Yet, for the deputy head in the Catholic school, the National Curriculum and SATs, despite some limitations, were welcomed. This underscores the fact that socio-cultural properties are not constraining or enabling in abstract isolation. Whether they are constraining depends on their incongruence with the aspirations and wishes of the actors concerned. However, the recently-appointed 'trouble-shooting' head of the 'failing' school initially maintained during interview that there 'doesn't have to be' a contradiction between child-centred learning and the secreted reductionist philosophy of SATs. Now, on five separate occasions, the head postponed the tape-recorded interview despite a firm promise well before the first date that was arranged. The head was defensive and reluctant to address many of the issues on

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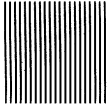
which I wanted to focus during the interview. I tried almost in vain to return to the contradiction, eventually being dealt what she considered was a blow that would complete that part of the interview. Her 'blow' consisted of an attempted A ← B syncretic manoeuvre, in direct contrast to Peters et al. She asserted quite simply that 'You need to *redefine* what you mean by child-centred learning' (my italics).
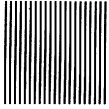
Regrettably, this was said near the end of the 50-minute interview and consequently I was unable to pursue the matter any further. Nevertheless, it was when she was forced to recognize the necessary contradiction that she was compelled to engage in corrective repair. No member of staff during the weekly meetings openly embroiled the head in the situational logic of a constraining contradiction. The reasons of course centred on the precarious position of all staff following the poor OFSTED report. And, even if they had, the head would have properly pointed out that her acceptance of SATs and its secreted philosophy is not the issue, since her job, in conjunction with staff, is to mediate quite stringent macro-level, socio-cultural emergent properties. Indeed, the deputy head, for instance, admitted during interview that, whilst publicly she would lend approbation to the head, privately she expressed complete dissatisfaction, providing examples of changed teaching methods, especially the 'teaching to SATs' over an eight-week period which entailed a complete disregard of whether children actually understood the material to be learned and regurgitated. In other words, there was no room for the classroom teacher qua facilitator.

For the majority of staff, then, the SATs phenomenon constitutes a fundamentally unwelcome third-order emergent property, exacerbated by an incongruent second-order emergent property between central government and the school (that is, the restructuring and overloading of teachers' roles engendered by the imposition of the National Curriculum, Standard Assessment Tasks, per capita funding, league tables, etc.). If we want to theorize how different teachers deal with (un)actualized cultural systemic properties, then we have to adhere to a working distinction between the causal and the logical. If the 'trouble-shooting' head *had* confronted a staff meeting in which a member of the senior management team pushed for a more child-centred approach in developing the school's OFSTED-imposed action plan, then, without the acknowledgement of autonomous logical relations impinging upon agency, we would forfeit an explanatory account of the subsequent use of power to deflect such an initiative that would have been welcomed by the majority of staff.

The Situational Logic of a 'Competitive Contradiction'

In direct contrast to the 'constraining contradiction', the invocation of A does not invoke some B and is therefore not a matter of systemic constraint. The existence of opposing groups or individuals championing different ideas is an essential precondition of a competitive contradiction. Its accentuation is an S-C affair and basically its logic is one which pre-

disposes *elimination* as opposed to the syncretic *correction* enjoined by the constraining contradiction. As Archer puts it:

> ... (b)ecause partisans of A and B are unconstrained by any dependence between these items, there is nothing which restrains their combativeness for they have everything to gain from inflicting maximum damage on one another's ideas in the course of competition. (1988: 240)

Exemplars of competitive contradictions are of course ideologies and their use in concealing sectional interests.

The recent literature on the changing nature of personnel management is an interesting example of the way in which ideational contradiction has resulted in a structurally conditioned stalemate, currently embodied in that ideational *mélange* called 'human resource management'. As Legge has rightly argued, '(b)oth the activity and personnel specialists are driven by contradictions that promote ambiguity of action. The chief contradictions are those embedded in capitalism' (1995: 10). The role of personnel manager exemplifies the situational logic of concession generated by the existence of structural (necessary) incompatibility; in this case, the generic incompatibility (or 'contradiction') between the forces and relations of production. Historically, in providing a legitimatory gloss on their role, personnel managers have invoked 'collectivist' ideas, reflecting their 'caring' or paternalist approach. They were endowed with the capacity to override the sectional interests of individual employers. This structured capacity derived from the successive legislative enactments prior to the Second World War that were designed to protect employees. Of course, the issue is not one of benign protection but rather one of mediating the inherent contradiction of capitalism, ensuring unimpeded extraction of surplus value by obscuring the commodity status of labour. The ideas used to buttress and legitimate the role of these 'caring' mediators whilst contradicting individualist market ideas did not depend upon the latter for their agential invocation, in contrast to the constraining contradiction.

Structurally, those within organizations who abhorred the paternalism of personnel managers were unable to banish them. Contracts *had* to be negotiated (or 'seen' to be negotiated thereby ensuring a role for the personnel manager, however attenuated or inflated). Personnel managers had structured vested interests in supporting trade-union de jure rights and obligations, simultaneously remaining committed to the goals and aims of capitalist organizations. Thus '(a)ny mediatory role, as with the proverbial Janus, runs the risk of giving an impression of two-facedness, with attendant loss of credibility' (Legge, 1995: 19). But, prior to the inauguration of the Thatcher years, one side of the face could be accentuated at the expense of the other since structurally the conditions were especially conducive—relative full employment being one of the obvious key factors. However, the Thatcher years of recession—of the 'enterprise culture'—and the substantial truncation of employment legislation have

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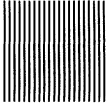
combined to force personnel managers to show the other cheek, as it were. In fact, both cheeks are often shown, leading commentators (Legge, 1989, 1995; Blyton and Turnbull, 1992) to underscore its contradictory nature, as reflected in the generic inconsistency between so-called 'hard' and 'soft' versions of human resource management.

Here, the contradictory items cannot be eliminated because otherwise, as Guest has noted, personnel managers would effectively render themselves redundant. As he puts it, 'if HRM is to be taken seriously, personnel managers must give it away' (1987: 51) since it contradicts the latter's traditional collectivist underpinning. It is precisely because they cannot be eliminated, because of the extant structural context that gives the upper hand to senior management, that the (logically) inconsistent approach of 'human resource management' has been constructed. Critics such as Legge (1995) and Blyton and Morris (1992) remain sceptical about HRM's survival given its mutually inconsistent premises (which centre round the three related issues of individualism versus co-operation; commitment versus flexibility; and a 'strong culture' versus adaptability). However, at the S-C level, the contradictory *mélange* of HRM sticks at present because other actors (namely, middle managers), whilst structurally predisposed towards elimination, currently need it to buttress their own precarious position and thus join in the unholy alliance in maintaining the essential rhetoric of HRM.

Concluding remarks

Whilst this brief introduction to the morphogenetic approach has been necessarily limited in its delineation, I hope that it has nonetheless made a useful contribution to the literature. It has been suggested that cultural analysis would benefit from a focus on that sub-set of cultural items to which the law of non-contradiction can be applied in order to parallel Lockwood's distinction between social and system integration, that is, between the 'people' and the 'parts'. Thus this article has been explicit in its rejection of current portmanteau conceptions of culture which at best conflate the logical and the causal, encompassing a disparate collection of organizational phenomena. However, not only has it been argued that culture be rid of its portmanteau or catch-all status, it has further been argued that the cultural system has emergent relational properties (of logical contradiction or complementarity) that causally condition specific courses of action for those who uphold some of its components. Such an approach is grounded in a stratified ontology of social reality which in turn enables methodological identification of the causal mechanisms and processes involved. The methodological means for this is analytical dualism, which is workable because of the sui generis nature of culture (and structure) whose mode of being is temporally prior to agential activity, whilst any change or modification post-dates such activity. Whilst there is nothing intrinsically wrong with portmanteau terminology, it must be
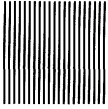
recognized that such terms unhelpfully compact distinct strata, thus making organizational reality intractable to analysis.
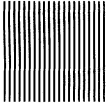
Notes

1 The continuing salience of gender (discrimination, sexual harassment, lack of promotion . . .) exemplifies the contingency of culture. Schools, for their existence, do not presuppose that boys and girls be treated differently or be held to possess differential levels of 'intelligence' and subsequently taught on that basis. Equally, of course, civil service departments would remain civil service departments *irrespective* of the gender of the incumbents who fill positions within them. The fact that teachers and managers may discriminate in varying and subtle ways enjoins an examination of ontologically distinct phenomena, the determinate co-existence of which is contingent. It is untrue theoretically to assume that all empirical phenomena within any organization are *necessary* for the organization qua organization. Meek maintains unconvincingly that:

> A university, for example, would not be a university without the ritual and symbols that surround such events as graduation ceremonies and inaugural lectures. The ritual is as old as the idea of the university itself. At graduation, academics and graduands clothe themselves in medieval garb and speak in foreign languages—Latin . . . most members of the university . . . all know that these artifacts symbolize the university, and they share a feeling of belonging to an academic community whenever the artifacts are displayed and the ritual performed. (1988: 468–9)

The issue of whether people feel a sense of 'belonging' is an empirical matter and cannot be decided a priori. However, does a university cease to be a university if (successful) students are posted their degree certificates in the absence of any form of ceremony? And does its signposting require symbolic representation? In sum, those who maintain that an organization *is* culture inter alia conflate the distinction between necessity and contingency. Whilst it is contingent that any organizational configuration exists, it is composed of internal and necessary relations (generically those between employer–employee); the question of who fills such positions and the actuality of symbolization is an analytically *separate* one.

2. Those commentators who rightly insist upon making analytical distinctions between culture (or structure) and agency but then swiftly proceed to withdraw ontological status from each are necessarily removing the methodological rug from under their feet. As Layder (1997: 102–3) argues, if an analytical or methodological distinction is not about something substantive in the social world then its status is merely rhetorical.

3. The notion of culture (or structure) as possessing sui generis properties has been wrongly assumed to entail reification; namely, that such properties are Cartesian disconnected supra-human 'substances'. But the phrase 'sui generis' means nothing more than 'of its own kind'. As Archer notes:

> The confusion arises etymologically because the same word *genus* (of which *generis* is the genitive) means 'birth', deriving from the older Sanskrit verb 'jan', meaning 'to be begat'. Hence the source of the Holistic

error that (reified) Society begets or generates its own (equally reified) properties. However, when referring to things, such as 'society', it denotes merely 'sort' or 'kind'. (1995: 48–9)

4   Morphostasis '(R)efers to those processes in complex system–environment exchanges that tend to preserve or maintain a system's given form, organization or state. Morphogenesis will refer to those processes which tend to elaborate or change a system's given form, structure or state' (Buckley, 1967: 58).

5   The explanatory utility and generic applicability of Lockwood's distinction were endorsed by Cohen (1968) and latterly by Craib (1997), Layder (1997) and Mouzelis (1991, 1992, 1997).

6   Transcendental realism, whilst upholding the logical distinction between ontology and epistemology, makes claims as to what reality *must* be like in order to enable social scientific analysis of which a priori propositions can be advanced. Bhaskar's appropriation of Kant's term 'transcendental' is not done without qualification. The difference consists in the fact that, while Kant's arguments lead to a theory about the structure-imposing power of the mind vis-a-vis the world, Bhaskar's lead to extra-discursive conclusions, namely about what the world must be like. This is where Bhaskar parts company with Kant, since we are not dealing with unknowable things-in-themselves.

7   See Willmott (1999) for a discussion of the distinction between asymmetrical and symmetrical internal social relations.

8   The 'Next Steps' initiative followed Sir Robin Ibbs' report *Improving Management in Government: Next Steps* and grew out of the changing socio-economic and political forces that had become persistent in their demands for change and 'value for money' (Brooks and Bate, 1994). 'Next Steps' laid the foundation for the creation of agencies which were to be accorded greater self-determination and the right to seek and achieve trading fund status. It was highly critical of the civil service 'culture' which disavowed risk-taking and pursued 'good house-keeping'.

9   The morphogenetic approach identifies four institutional configurations and their situational logics. Such situational logics entail different forms of strategic action by predisposing different sections of the population (or organization) to maintain their vested interests by *defensive, concessionary, competitive or opportunist* modes of social interaction. The example in this article addresses the situational logic of concession. For obvious reasons of brevity, it does not address the remaining three (see Archer, 1995: 218–29).

10 In his critique of Giddens, Thompson (1989) notes that certain individuals have restricted opportunities for entry into a variety of organizations; universities and schools cited as exemplars. He argues that such restrictions cannot be adequately conceptualized in terms of 'moral rules' or 'sanctions', since such restrictions may operate independently of the rights and obligations of the agents concerned:

> It also seems inadequate to conceive of such restrictions as unintended consequences of action, like the homeostatic causal loops involved in the poverty cycle. For the issue is not so much whether the restrictions are intended or unintended consequences which may become the conditions of further action. Rather, what is at issue is the fact that the restrictions on opportunities operate *differentially*, affecting unevenly various groups of individuals whose categorization depends on certain assumptions about
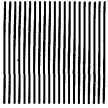
social structure; and it is this differential operation or effect which cannot be grasped by the analysis of rules alone. (p. 65, original italics)

Giddens (1989) readily concedes that there are no rules attaching to being poor, having restricted access to prestigious universities and so on. However, he maintains that instead we should analyse 'certain forms of *system repro-duction*, in which complexes of rules and resources are implicated. For instance, Bernstein's distinction between restricted and elaborated codes ... would certainly be relevant to understanding such differentials in life chances' (p. 257, original italics). Yet this is a restatement of the problem! Giddens is merely transposing the untenability of theorizing differential life-chances in terms of 'rules and resources' to the systemic level which, as we have seen, comprises emergent relational properties of complementarity or contradiction. His reference to Bernstein does not advance his case precisely because Bernstein's distinction only makes sense relationally— in the context of irreducible class relations. The point is to explain theoretically why certain sections of the population are subject to a 'restricted code' in the first place. Again, this can be done only by reference to relatively enduring sui generis structures.

11 The importance of the ideational aspects of organizational behaviour is recognized by, among others, Allaire and Firsirotu (1984) and Alvesson (1993). Thus, to Alvesson, '(e)ven though it is wise to reserve the culture concept to the ideational there is no reason it cannot be used to address the symbolism associated with social structure and material conditions' (p. 64). The morphogenetic approach does not wish ontologically to extinguish symbolism and its use in organizations (advertising being an obvious contender for analysis). Instead, it would tend to bypass such analysis because of its relative insignificance. Alvesson sums up the issue succinctly a page later:

Daft (1983) gives the following examples of symbols within organizations: corporate anniversary celebrations, receipts ... organization charts, annual reports, company logos, and stories and myths. *It is questionable whether the symbolic nature of ... these examples is of any particular significance or interest.* (p. 65, my italics)

In contradistinction, the morphogenetic approach distinguishes a sub-set of cultural phenomena (that is, propositions) precisely because of the undeniable significance of those items which assert truth or falsity at any given time in any organization.

12 As Layder (1997: 128) notes, 'objective' here is not meant to express a claim about truth or falsity but is instead a claim about the relation between knowledge and the human beings who produce it; and that, furthermore, 'objective' should not be taken to imply that such knowledge (the CS) is unchanging and beyond the grasp of human intervention.

13 Even those who have 'photographic memories' would not have the time to digest and retain an ever-expanding CS; moreover, a photographic memory does not endow one with the capacity to pinpoint every conceivable logical contradiction and/or complementarity among its components, whose logical relations may bear upon an infinite number of situations.

14 Indeed, it may be argued that sexist ideology, beliefs, etc. are not so neatly lodged in the Library or the CS, for there exists no equivalent of a mathematics manual or literary journal. Whilst there is no sexist manual per se

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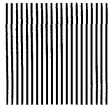
(although historically one can easily dig up numerous pamphlets regarding women's 'natural' role in the home and so on), *propositions can be passed on orally*. As Popper argues, as far as objective knowledge is concerned, 'it may be said to be the world of libraries, of books and journals, but also of oral reports and traditions' (1994: 32). That such propositions are passed on establishes their irreducibility to human minds (or 'World Two' thought-processes).

15 'Furthermore, referring to subcultures does not solve the problem of heterogeneity or contradiction; organizational ideologies can be divided into fundamental and operative groups' (Alvesson, 1993: 63). The use of the prefix 'sub' denotes Schein's unremitting a prioristic need to render culture an integrative force within organizations, untenably playing down the role of systemic contradiction.

16 The morphogenetic approach identifies four cultural configurations and their situational logics. Again, such situational logics entail different forms of action by predisposing different sections of the population or organization towards *correction, protection, elimination or opportunism*. The examples in this article address the situational logics of 'constraining' and 'competitive' contradictions respectively (see Archer, 1995: 229–45 for a discussion of the remaining two).

17 The first school was held to possess 'serious deficiencies' by an OFSTED (Office for Standards in Education) team of inspectors in July 1996. As the OFSTED report mentioned, the catchment area has mainly local authority housing and 'high levels of economic and social deprivation' (OFSTED, 1996: 6). The school came bottom of the League Table in the LEA. One of the key issues raised in the report was the lack of 'value for money'. The second school, by contrast, had a mainly middle-class intake, not derivable from its immediate area. It is a Roman Catholic voluntary-aided school; its SATs results positioned it near the top of the LEA League Table.

18 SATs are compulsory tests for all seven and 11 year olds in England and Wales, and cover English, maths and science. The results are published nationally, comprising discrete League Tables for each Local Education Authority.

19 For trenchant critiques, see Blenkins and Kelly (1994); Fisher (1996); Davies (1994); Hamilton (1994).

20 SATs' philosophy inter alia is part and parcel of the 'performance indicator' disease that since the mid-1980s has infected almost every nook and cranny of the public sector. The problem with SATs is its essential reductionism (Cutler and Waine, 1994), bypassing the cognitive processes by which children learn and develop. Indeed, as with all performance indicators, it grossly distorts reality in its dependence on proxies for measured outcomes. Thus, to Cutler and Waine, 'The intangible character of outcomes means that measures are always dependent on constructs, which attempt to generate proxies or substitutes for the outcome. The central difficulty, therefore, lies in the fact that the proxy can be criticised for failing to capture the character of the outcome' (p. 35). As they point out, how do we measure whether 'quality of life' has been improved and if knowledge has been developed?; how do we determine whether we are adjusting to the goals of school pupils and discover whether our curriculum is appropriate? As Ball (1990) points out, the parameters of OFSTED (whose essential remit is to assess the 'effectiveness' of
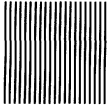
schools in improving SAT scores) operate judgementally within the input–output logic of the commodity form and displace and *exclude* other criteria of judgement.

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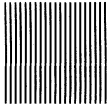
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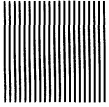Kilpatrick, W.H. (1918) 'The Project Method', *Teachers College Record* 19: 319–35.
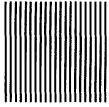
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