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# Ocularcentrism and its Others: A Framework for Metatheoretical Analysis

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### Descriptors

Ocularcentrism, metatheory, philosophy, epistemology, paradigms, vision.

## Ocularcentrism and its Others: A Framework for Metatheoretical Analysis

#### Abstract

There is a contemporary skepticism towards vision based metaphors in management and organization studies that reflects a more general pattern across the social sciences. In short, there has been a shift away from ocularcentrism. This shift provides a useful basis for meta-theoretical analysis of the philosophical discourse that informs organizational analysis. The paper begins by briefly discussing the vision-generated, vision-centred interpretation of knowledge, truth and reality that has characterised the Western philosophical tradition. Taking late 18<sup>th</sup> century rationalism as the high-point of ocularcentrism, the paper then presents a meta-theoretical framework based on three trajectories that the critiques of ocularcentrism have subsequently taken. The first exposes the limits of the metaphor by, paradoxically, taking it to its limits. The second trajectory seeks to displace the primordial position of the ocular metaphor and replace it with an alternative lexicon based on other human senses. Finally, the third trajectory describes how the Enlightenment ocular characterisation of the visual and mental worlds has effectively been inverted in the postmodern moment.

#### Introduction

The central argument of this paper is that we can get a deeper understanding of organizational theory and practice through considering the position in discourse of visual or ocular metaphors. Ocularcentrism is the term used to describe a paradigm or epistemology based on visual or ocular metaphors and the paper begins by outlining the characteristics and development of this paradigm. In many respects, this paradigm is still very much in the ascendancy across the social and natural sciences, although it has also been comprehensively attacked by philosophers, social theorists and political scientists. The various critiques are classified into three trajectories which, informed by the original paradigm, provide the basis for a 'meta-theoretical' framework that distinguishes between different theoretical positions and schools of thought. This framework, which is schematically depicted in Figure 1, provides a counterpoint and addition to earlier schemes, such as those devised by Burrell and Morgan (1979), Pfeffer (1982), Deetz (1996) and MacKenzie (2001).

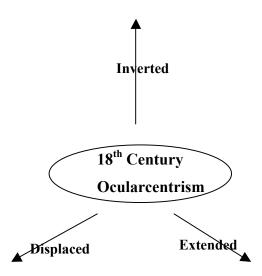


Figure 1. Metatheoretical trajectories

By its nature, theorizing abbreviates data. In metatheorizing, where the 'data' is extant theory, this abbreviation necessarily means that complex bodies of thought may have to be simplified and significant differences in the theoretical matrix glossed over (see Ritzer (1992) for further discussion on metatheorizing). Put another way, metatheory is based on meta-metaphors (as is all thought) that provide a way of seeing – of illuminating – *and* a way of non-seeing, of obscuring (for further discussion on metaphor, see Lakoff and Johnson (1980) and Morgan (1980; 1983)). This paper adopts the position that metatheorizing *is* useful – and metatheoretical frameworks are especially useful – in unravelling what for many people is an incoherent tangle of disparate ideas.

The bulk of the paper considers the three different trajectories that the critiques of ocularcentrism have taken. The first consists of writers who have critiqued the vision metaphor by taking it to its extreme, but who also, somewhat paradoxically, retain the metaphor's central position in their own texts. This trajectory is referred to as *ocularcentrism extended*. The second trajectory seeks to excoriate the root ocular metaphor. *Ocularcentrism displaced* traces the metaphoric redescriptions and displacements that have been effected through this approach. We can, for example, consider much of 'postmodern' philosophy as an agonistic moment in a metaphoric struggle between a paradigm based on vision and an alternative one based on other senses, especially the sense of hearing. The third trajectory, *ocularcentrism inverted*, effectively inverts some of the categorical distinctions on which ocularcentrism is founded, in particular the understanding that theory is pure, in contrast to the impurity of the 'real' world.

#### The Ascendancy of the Eye

With considerable justification, we can characterise Western culture as an ocularcentric paradigm, based as it is on a vision-generated, vision-centred interpretation of knowledge, truth and reality. At the outset, it is worth summarising the key contributions to the ocularcentric paradigm made by Plato, Descartes, and the philosophers of the

Enlightenment (for more extensive discussions on the philosophical roots of ocularcentrism see Jay (1993a), Levin (1993b), Jonas(1966)).

Plato made the important distinction between the sense of sight, which he grouped with the creation of human intelligence and soul, and that of the other senses, which he placed with man's material being. Not only was sight 'by far the most costly and complex piece of workmanship which the artificer of the senses ever contrived' (Plato 1974: VII/S507) but sight, unlike the other senses, had a theological dimension as it was directly connected, via light, to the sun deity: 'the sun is not sight, but the author of sight who is recognised by sight' (Plato 1974: VII/S508). Plato also made the critical division between the visible world and the intelligible world (Plato 1974: VII/S509-10), although his description of the latter is always based on ocular metaphors: for him, the 'soul is like the eye' (Plato 1974: VII/S508) and things in the intelligible domain 'can only be seen in with the eye of the mind' (Plato 1974: VII/S510). His well-know myth of the cave was especially important in the development of the ocularcentric paradigm because it demonstrated how the immediately experienced sight of one's eyes (the visible world) is impure, in contrast to the pure Truth that is only attainable through the speculative ability of the mind's eye (the intelligible world). Plato's interpretation of the allegory is that 'the prison-house is the world of sight, the light of the fire is the sun, and ... the journey upwards [is] the ascent of the soul into the intellectual world', which, importantly, he always describes using light, sight, shadows and vision, for example:

the world of knowledge...[which] when seen is also inferred to be the universal author of all things beautiful and right, parent of light and of the lord of light in this visible world, and the immediate source of truth in the intellectual; and that this is the power upon which he who would act rationally either in public or private life must have his eye fixed. (Plato 1974: VII/S517)

Because ocular metaphors are primordial in both the visible and intelligible worlds, we will restate Plato's demarcation as a distinction between the 'eyes on one's head' (which we will refer to as *e-vision*) and the 'eye in one's mind' (*m-vision*). Ever since, the ocularcentric paradigm has been driven by a constant play between these different 'eyes' (for instance Merleau-Ponty, in *Eye and Mind*, argues for a 'third eye which sees the paintings and even the mental images' (Merleau-Ponty 1964: 165)). This distinction, as depicted in Figure 2, came to be foundational in modern thought.

Modern Thought

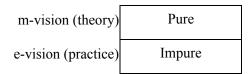


Figure 2. The categorical distinction between m-vision and e-vision.

So impressed was Democritus by Plato's reasoning that he supposedly blinded himself in order to better 'see' with his intellect and thus discern truths denied to his normal vision. Likewise, Plato's suspicion of e-vision was the reason for his hostility to all mimetic arts, which he saw as a form of deception. Many centuries later, Descartes was equally distrustful of what he saw and, like Plato, he rejected the visible world (e-vision) as a potential or actual illusion. Ironically, his alternative – the sovereign power of reason – was essentially a model based on the metaphorics of vision (the mind's eye) in which the properties of the visible were transferred into the mental domain. Descartes then used this model-in-thought to construct the visible world (as in, for example, his *Dioptric* (Descartes and Olscamp 1965)). The ocular paradigm was further enhanced by the discovery of perspectivism in the 16<sup>th</sup> century and Newton's work on optics in the 17<sup>th</sup>

century. As Berger (1972: 16) put it: '[p]erspective makes the single eye the center of the visible world. Everything converges on to the eye as to the vanishing point of infinity. The visible world is arranged for the spectator as the universe was once thought to be arranged for God'. In time, the modern individual (the 'I') came to be centred on, if not abbreviated to, the eye ('I' = eye).

This infatuation with the visual reached a new zenith during the Enlightenment – a term that is itself based on an ocular metaphor – when the rationalist understanding that the mind's eye (Reason) could potentially 'see' the Truth, came to dominate intellectual thought. For rationalists, 'a certain class of reasons ... carry their own credibility with them: they will be visible because they glow by their own light' (Barnes and Bloor 1982: 29). What is interesting for our purposes is that many of the Enlightenment's central precepts, such as objectivism, reflection, critical rationality, and subjectivism, are fundamentally based on the primacy accorded to the visual. In particular, the dominant ocularcentric paradigm promulgated during the Enlightenment worked to elevate static Being over dynamic Becoming and fixed essences over ephemeral appearances. This ontological consequence is because, as Jonas (1966) has explained, sight is essentially the sense of simultaneity, of seeing a wide field at one moment, while hearing is significantly more temporal because it operates through intertwining past, present and future into a meaningful whole. And sight, unlike hearing, leaves the visible undiminished by its action, creating a unique sense of otherness. Moreover, the phenomenon of distancing, which is the most basic function of sight, helps create the belief that objects are distant from and neutrally apprehended by sovereign subjects, which, in turn, provides the basis for the subject-object dualism that is so typical of Greek and Western metaphysics.

The dominance of visual metaphors continues to this day in contemporary academic discourse: in conceptualising we seek insight and illumination; we speculate, inspect, focus, and reflect; and when we speak of points of view, synopsis, and evidence, we may forget or be unaware of these concepts' sight-based etymology. The 'spectatorial' nature of modern epistemology is also evident when we consider that the word theory has the same root as the Greek word for 'theatre', *theoria*, meaning to look at attentively, or to behold. Likewise, writing is largely a visual exercise, in contrast to speaking, which is centred on the sense of hearing. Thus, in modern philosophy the eye is the hinge point between the subjective and the objective, the window to the world and the mirror of the soul. In this spectatorial epistemology the ocular subject has become the ultimate source of all being, with 'the world' being seen, reflected in, represented by, objectified and instrumentalised by the sovereign subjective self.

While this spectatorial epistemology has remained dominant in Western philosophy, it has also been severely critiqued by a host of philosophers over the last century or so, although rarely is the visual metaphor used as the primary basis of the critique (see, however, the seminal article by Jonas 1966 and works by Levin (1993b; 1997), Jay 1993a, and Brennan and Jay 1996). This paper presents one categorisation of the various alternatives to rationalism based on three different ways of dealing with Western ocularcentrism. This categorisation provides a useful way of mapping out and disentangling quite different critiques, and, by attending particularly to the metaphorics of vision, provides potential for reflecting on the dominant metaphors we use and the practices we engage in.

The first group – discussed under the section titled, *ocularcentrism extended* – critiques rationalism by taking the ocular metaphor to its limits. The group includes the Romantics (who rejected the rational vision in favour of fantastic visions) and it also includes the 'postmodern counter-visionaries'. A feature of the latter is that even though they diagnose problems with the ocular basis of Western philosophy, their own works are still essentially visual or ocular in nature. The second group is characterised by a more profound attempt to move away from and dispense with visual metaphors, hence the title: ocularcentrism displaced. The group includes what are referred to as the 'process philosophers' (e.g. Bergson, Heidegger, Dewey, Rorty, Habermas). It also includes, paradoxically, both conservatists and postmodern radicals such as, for instance, Laclau and Mouffe. Jean Baudrillard is at the hub of the third group, and in the section titled ocularcentrism inverted, I use some of his ideas to argue that the hierarchical categorisation depicted in Figure 2 has actually been *inverted* in late modernity, with the result that vision has now been effectively displaced from the political into the commercial domain.

#### **Ocularcentrism Extended**

If rationalism reached its high-water mark in the 18<sup>th</sup> century, it was subsequently critiqued by both romantics and conservatists in the 19<sup>th</sup> century, and by most everyone else in the 20<sup>th</sup> century. However, with respect to the root ocular metaphor of rationalism it is useful to distinguish between those critiques that seek to displace the metaphor and those that retain it. In this section we consider the latter, namely the Romantics (including Nationalists and Socialists) who concoct and follow utopian visions, and the Postmodern Counter-visionaries who, while they critique ocularcentrism, still remain within its thrall.

#### The Fantastic Visions of Romantics, Nationalists and Socialists

In their attempt to move away from Enlightenment rationality, the Romantics of the  $19^{th}$  century stressed the imaginative, the irrational, and fantastic aspects of the human creative mind. Yet, in so far as Romanticism retains the primordial position of the human mind, it is best seen as an extension and deepening of the Enlightenment rather than an alternative philosophy. Thus the Romantics presented mental pictures of what the world *might be* like – instead of the Rationalist picture of what the world *was* like. To emphasise the difference, Abrams (1953) used the metaphors of mirror and lamp to distinguish between the two movements. For Abrams, the rationalist mind is a 'reflector of external objects,' while the romantic mind is a

a radiant projector which makes a contribution to the objects it perceives. The [mirror metaphor] was characteristic of much of the thinking from Plato to the eighteenth century; the [lamp metaphor] typifies the prevailing romantic conception of the poetic mind (1953: viii).

While Abrams asserts that the two metaphors are 'antithetic' to one another, for us they are both fundamentally ocular, or sight based. Moreover, the Romantics followed in the tradition of the rationalists by invariably presenting optimistic, progressive – and one might say innocent – visions of the future. Prototypical of these creative and imaginative visions was the 19<sup>th</sup> century catalogue of utopian texts that provided a life-force and inspiration for many subsequent political and social movements.

While one has to be wary of reductionism, it is clear that the Romantic movement of the early 19<sup>th</sup> century provided an important philosophical basis for both socialism and nationalism, the two primary movements of radical political change in the late 19<sup>th</sup> century and throughout the 20<sup>th</sup> century (Jones 1974). In particular, romantic literature,

with its celebration of the vernacular and folk traditions, certainly inspired nationalistic feeling throughout Europe in the 19<sup>th</sup> century. Moreover, in terms of ocular metaphors, both nationalism and socialism were still founded on a 'fixed point of view', or what Trimble refers to as 'the Platonic pursuit of abstract perfection.'

I say Platonic because that savage pursuit of abstract perfection starts in the western world with Plato's Republic. It rises to a plateau with the French and Russian revolutions. It descended to new depths with the Nazis and is present in all the national, ethnic and religious conflicts current after the collapse of communism, itself the most determined and ruthless Platonic experiment in perfecting the economic system whatever the cost in human life (Trimble 1998).

Marshal McLuhan identified a further connection between ocularcentrism and nationalism when he noted the important role played by print technology during the 19<sup>th</sup> century: 'by print a people *sees* itself for the first time. The vernacular in appearing in high visual definition affords a glimpse of social unity co-extensive with vernacular boundaries' (McLuhan 1962: 217, original emphasis). Elsewhere he reiterated the link when he asserted that '[n]ationalism depends upon or derives from the 'fixed point of view' that arrives with print, perspective, and visual quantification' (1962: 220).

#### Postmodern Countervisions

While the Romantics of the early 19<sup>th</sup> century critiqued Enlightenment rationality, Nietzsche was the first writer to attack *ocularcentrism* when he argued against the philosopher's presupposition of an eye outside time and history, 'an eye that no living being can imagine, an eye required to have no direction, to abrogate its active and interpretative powers' (Nietzsche [1887] 1969: 255). As early as the 18<sup>th</sup> century the import of an individual historian's perspective on history was well understood, but Nietzsche took this further by asserting that *every* discourse could only be understood as a perspective – 'all seeing is essentially perspective and so is all knowing' (Nietzsche [1887] 1969: 255) – and he developed this insight to present a radical critique of both philosophy and science. Nietzsche's rhetorical device was to subvert the visual by turning it in on itself through extending and multiplying its logic. As Jay (1993a: 190) put it: 'Plato's singular sun of truth illuminating a reality of forms was replaced by a thousand and one suns shining on a multitude of different realities.' What is important for our purposes is that the visual metaphor is still central in Nietzschian multi-perspectivalism. Derrida, in tandem with many other 20<sup>th</sup> century philosophers, has critiqued the ocular

nature of Western philosophy, saying that

the metaphor of darkness and light (of self-revelation and self-concealment) [is the] founding metaphor of Western philosophy as metaphysics . . . [I]n this respect the entire history of our philosophy is a photology, the name given to a history of, or treatise on, light (Derrida 1978: 27).

Paradoxically, Derrida's anti-ocularcentrism is at odds with his thesis that writing is more fundamental than speech, since writing, as we have seen, is manifestly a visual activity (see McCumber (1993) for development).

Foucault was just as averse to the 'spectator' theory of knowledge, but his line of argument was quite different. Foucault's insight was that while the subject was constituted as a detached, contemplative, disinterested, autonomous entity in a spectatorial epistemology, his historical studies showed how the subject was better understood as being incarcerated and indeed constituted by various technologies of visualisation. For him, vision becomes supervision: 'the gaze that sees is the gaze that

dominates' (Foucault 1973: 39). In other words, the power to see, to make visible is the power to control, which is why Foucault sees knowledge and power as fundamentally indwelling. In the Birth of the Clinic, (subtitled 'An Archaeology of Medical Perception"), he argued that the medical gaze took hold once pathological anatomy and the autopsy – which was essentially a project of spatialising disease – came to be accorded central status in medical practice after 1800. In Discipline and Punish, he mapped out the nineteenth century shift from sovereign to disciplinary power: the shift from 'governmentality organized around the gaze of the sovereign to governmentality organized by surveillance, panopticism, the normalising gaze dispersed throughout the social system, maintaining civil order' (Levin 1993a: 20-1). In a disciplinary regime, 'power is exercised by virtue of things being known and people being seen . . . by surveillance rather than ceremonies' (Foucault and Gordon 1980: 154), and in this regime, individuals are no longer autonomous entities, but are better understood as being constituted by technologies of visualisation, such as the examination, which, in turn, includes self-observation, self-examination, and self-monitoring. Notwithstanding Foucault's antipathy to vision, his archaeological and genealogical methods are fundamentally ocular – in so far as they make visible the correlations between vision and truth, and vision and power, respectively - and he makes generous use of spatial metaphors throughout his writings (see Flynn 1993 for development).

Other writers have also followed a similar path, critiquing modern epistemology but still retaining the ocular metaphor as central to their 'new' paradigm. Typical of this approach would be the so-called 'reflexive turn' taken by many sociologists of science during the 1980s on the back of the postmodern critique of modern epistemology (see, for example,

14

Woolgar 1988). One difficulty with this project is that the concept of reflection is itself based on an ocular metaphor, which is precisely why Winner (1993: 373) dismissed the reflexive turn as 'that endlessly enchanting hall of mirrors'. Within this group we might also locate the more self-indulgent and self-centred of the postmoderns.

#### **Ocularcentrism Displaced**

Writers in this category are equally hostile to Enlightenment rationality, but what makes them more radical than those in the previous category is that not only do they reject the ocular metaphor but they also attempt to replace it with a quite different set of metaphors and vocabulary. We begin by summarising the more significant endeavours to place other senses – especially hearing but also the sense of touch – at the centre of philosophical discourse. The paper then proceeds to explain why it is appropriate, if paradoxical, to place conservatists and postmodern radicals within this category on the basis that they both seek to jettison the visual metaphor from political discourse.

#### The Linguistic Turn: From Sight to Sound

Over the last century or so, a succession of philosophers have revolted against the legacy of Cartesianism and the Enlightenment, and have denounced the 'spectatorial and intellectualist epistemology based on a subjective self reflecting on an objective world exterior to it' (Jay 1993b: 143). One of the most significant shifts occurred in the early part of the 20<sup>th</sup> century with the development of structuralism. In particular, the contribution of the linguist Ferdinand de Saussure proved hugely influential as it marked a profound shift towards language and narrative. Since language is fundamentally about speaking – and hearing – we identify the development of structuralism as a 'metaphorical

redescription' from a paradigm based on vision and sight to one based on speaking and hearing. We assert this even though it is clear that language and communication is not exclusively based on speech.

The power of Saussure's ideas quickly led others to see interesting analogies between language and other domains. Thus, what links the various forms of structuralism is their common use of Saussure's ideas to study a variety of symbolic relations - understood as an underlying system of differences – whether these be structured by language, class, or whatever. The primacy that the structuralists have accorded language has endured throughout the 20<sup>th</sup> century. So, for instance, Hans-Georg Gadamer argued for a shift from seeing to a conversation-based hermeneutics, while Jürgen Habermas's work can similarly be interpreted as a project to move from a rationality grounded in a detachedspectator paradigm to one based on communication, speech, and democratic participation. Centrally, the subject in Habermas's philosophy is neither the dominating observer nor an observed subject, but a speaking, listening subject participating in democratic practices. The same theme is to be found in the so-called 'voice discourse' which asserts the primacy of speech (experience) over writing (theory) and which counters knowledge claims based on a spectatorial epistemology with narratives of the silenced and excluded (see, for example, Spivak [1985] 1988). Likewise, the American pragmatist Richard Rorty (1979) has rigorously refuted the picture of the mind as a mirror of theoretical reflection. Instead of ocular theories of truth that make truth a matter of correspondence, he proposed a conception of truth and mind based on discourse. And if we see, as Rorty (1989: xvi) does, 'the history of language, and thus of the arts, the sciences, and the moral sense, as the history of metaphor' then we can understand the profound shift in philosophical discourse away from theory and toward narrative as a move in metaphorics from sight to hearing.

It is arguable that organization theory and management studies have always embraced this 'narrative turn.' For instance, the influential writings of Chestar Barnard (1938) and, more generally, case studies are, in essence, based on a narrative rather than a logico-scientific form of knowledge (Bruner 1986). At the same time, positivist epistemology has maintained an almost hegemonic position in these fields. This hegemony has come under attack, especially through the influence of Burrell and Morgan's famous framework, and, more latterly, through organization theory's own narrative turn (Van Maanen 1988; Czarniawska-Joerges 1998; Gabriel 2000).

One of the significant limitations of structuralism, and it is a limitation that the poststructuralists have sought to transcend, is its tendency to focus on the *synchronic* aspects of linguistic difference at the expense of the more processual, *diachronic* elements. This critique led to an increasing and ongoing engagement, throughout the century, with processual understandings. This shift, in our sense-based framework, can be seen as a shift towards the hearing and touch, since these senses necessarily involve change over time.

#### The Process Philosophers

One of the first modern philosophers to dispute the noble position accorded to sight was Henri Bergson, writing around the same time as Saussure. Bergson asserted that both idealists and materialists, the massive polar anchors of philosophical debate, were both too cognitive, and were incapable of appreciating that the body was not just an object of contemplation but was actually the primary site of lived action. Hannah Arendt set the measure of Bergson's influence when she asserted that '[s]ince Bergson, the use of the sight metaphor in philosophy has kept dwindling, not unsurprisingly, as emphasis and interest has shifted entirely from contemplating to speech, from *nous* [mind] to *logos* [word]' (Arendt 1978: 122). In particular, Bergson railed against the spatialisation of time and the profound mistake of reducing the *qualitative* difference between past, present and future to a simple *quantitative* distinction. The particular problem with reducing temporality to a number-line was that it privileged sight, since 'every clear idea of number implies a visual image in space' (Bergson and Pogson [1889] 1971: 79). This was hugely important to Bergson because, for him, experienced time depended more on the non-visual senses, such as hearing and touch, which intertwine past, present and future into a meaningful whole.

Contemporaneous with Bergson, the American pragmatists (Peirce, Dewey, James) also celebrated action, change, negotiation, and the 'plastic' nature of reality over fixed principles, abstractions and essentialist beliefs. A.N. Whitehead was another 'process philosopher' who drew the various strands of this emergent philosophy together in his vast book *Process and Reality* (Whitehead 1929). Around the same time, Martin Heidegger published *Being and Time* and he continued to make sustained attacks on the ocularcentrism of Greek and Western philosophy throughout his career. His language and vocabulary were different but his central point was that ocularcentrism had reduced being to being-represented or being-imaged. In other words, the very being of the world had come to be equated with our images and representations, which, for him, was an inauthentic existence:

Metaphysics thinks about beings as beings. Whenever the question is asked what beings are, beings as such are in sight. Metaphysical representation owes this sight to the light of Being.

The light itself, i.e., that which such thinking experiences as light, does not come within the range of metaphysical thinking. .... Metaphysics, insofar as it always represents only beings as beings, does not recall Being itself. (Heidegger 1975: 207-208)

Heidegger was extremely critical of the visually orientated Greek notion of *theoria*, and he lamented the reduction of *theoria* to observation in modern empiricism. He contested the privileging of a spectatorial vision that made subject and object distant and estranged from one another, and, like Bergson, he repudiated ontologies that made spatial existence prior to temporality. He also contrasted the early Greek attitude of *wonder* – which lets things be – with the modern sense of *curiosity* – which is symptomatic of a predatory possessiveness and a calculating, self-interested, will to power. Instead, Heidegger preferred to give ontological primacy to 'speaking', 'listening to' and 'silence': 'listening to ... is Dasein's existential way of Being-open as Being-with for Others. Indeed hearing constitutes the primary and authentic way is which Dasein is open for its ownmost potentiality for Being' (Heidegger [1927] 1962: 206); 'language stands in essential relation to the uniqueness of being ... Being is the most said and at the same time a keeping silent' (Heidegger [1981] 1993: 54)

Heidegger employed novel linguistic and hermeneutical techniques, coining new words at will to aid his attempt at comprehending being in new ways. Other philosophers have continued this tradition, which we can now see as a metaphoric revolt against the dominant ocular metaphor in Western philosophy. In organization theory, this turn to process is also evident in, for instance, the influence of constructivism, actor-network theory and the more philosophical writings of Robert Chia (1995) and Robert Cooper (Cooper and Law 1995) to name but two of the more prominent writers. More broadly, this interest in process (means) rather than ends (visions, utopias) is a feature of contemporary political discourse, whether it be articulated by conservativists or what we might refer to as postmodern radicals.

#### The Displacement of Vision in Political Discourse

Vision, and especially any form of radical vision, has been shunted to the margins of political discourse. Many in society, it seems, are at one with David Trimble, who, on receiving the Nobel Peace, stated that '[i]nstinctively, I identify with the person who said that when he heard a politician talk of his vision, he recommended him to consult an optician' (Trimble 1998). In his Nobel speech, David Trimble drew extensively on Edmund Burke's conservatist thesis that the pursuit of 'abstract perfection' had to be rejected, for the simple reason that humans are imperfect. Both Burke and Trimble see this pursuit as dangerous because it engenders a 'passion to change other people's personal, political, religious or economic views by political violence.' Thus, in terms of the ocularcentric paradigm, we can understand Burkean conservatists as radical in so far as they reject the vision metaphor that underpins both Rationalism and Romanticism (and, in turn, Socialism and Nationalism). Burke's (and Trimble's) philosophy was to remain true to tradition and the status quo, imperfect and all as it might be. Of course some might say that the ruling 'caste', because of their standpoint, will be blind to the problems that others can see all too clearly; namely differential relations of power and equality.

In many respects, Burkean conservatism has been the dominant political movement in the second half of the 20<sup>th</sup> century. The success of conservatism and the reluctance to extol alternative visions of the future is understandable since many have linked the totalitarianism and fascism, which have punctuated the twentieth century, with the

romantic pursuit of utopian visions. The compelling conservatist argument is that Romanticism leads not to utopia but instead creates Hitlers and the dystopias of Nazi Germany, ethnically cleansed of those that don't fit the perfect vision.

Such antipathy to visionary thinking is maybe to be expected from conservatives who axiomatically reject any alternatives to the status quo, but today even socialists seem unable to articulate a clear vision of what society should be like, having largely lost faith in the utopian beliefs that propelled their common projects for over a century. As Giddens put it, 'the hopes of radicals for a society in which, as Marx said, human beings could be 'truly free' seem to have turned out to be empty reveries' (Giddens 1994: 1). This eclipse of past visions now leaves the Left unsure and tentative, and few today, even those that still claim to be radicals, believe in revolutionary change towards a socialist ideal of what society should be like. Donna Haraway, one of the more radical thinkers of our age, summed up the situation when she admitted that: 'I think that the most difficult problem that I face, if I own up to it, is I have almost lost the imagination of what a world that isn't capitalist could look like. And that scares me' (Harvey and Haraway 1995: 519). Moreover, what it means to be radical is further obscured by the fact that conservatism has become radical, under Thatcher's neo-liberal reforms, while socialism has become conservatist, in so far as socialism's practical activity is now largely centred on maintaining the welfare state (Giddens 1994; 1998).

Notwithstanding the threat of implosion, some have sought to continue the tradition of radical socialist thinking, while being careful to avoid the problems with utopian, vision-centred teleologies or grand narratives. I refer to these writers as 'postmodern radicals'

21

because of the uneasy conjunction that they straddle. The 'post-marxist' scholars, Laclau and Mouffe are representative of this position.

Laclau and Mouffe's work can be understood as an instance of this postmodern incredulity towards modernity's valorisation of purity. In their most famous work, *Hegemony and Socialist Strategy*, they draw on the postmodern literature to question (a) the privileged position of the 'working class' in marxist theory and its status as an ontological *a priori*; (b) the possibility of historical necessity and the discourse of 'eschatological universality' - i.e. that there is a fixed end-point that all societies are heading towards; and (c) the utopian image of a communist society devoid of antagonisms. In short, what Laclau and Mouffe railed against was Marxism's 'monist aspirations to capture with its categories the essence or underlying meaning of History' (Laclau and Mouffe 1985: 4). Recognising the plurality and dynamic ontology of both subjects and contestations in contemporary societies, Laclau and Mouffe assert the case for a 'radical, libertarian and plural democracy'. Drawing on Saussure's work in linguistics, they argue for a purely relational understanding of political identity and political struggles. Just as the meaning of a word is constituted by its network of relationships with other words, so too each political identity and political struggle must be understood in terms of its relationship with other identities and struggles. Building on this point, they argue for the articulation – as in linking together – of different struggles and movements – for example, between struggles based on class, race, gender, sexual orientation, ethnic origin, and religion within an overall hegemonic structure wherein no particular struggle is seen as primary.

22

Following in the tradition of Lyotard and Foucault, the postmodern radicals reject metanarratives or big teleological stories, and hence have little truck with either romantic utopias or political ideologies as a basis for understanding social change. In particular, Laclau and Mouffe have critiqued the eschatological dimension in Marxist thought as a 'dangerous illusion' and likewise they reject the myth of social progress towards some great vision. This is consistent with Habermas's point that we now suffer from a general 'exhaustion of utopian energies' wherein 'the future is negatively cathected' (Habermas 1989: 50), by which he means that visions of the future are now attributed with negative meanings. For Habermas, utopian thinking is now limited to *procedural* utopias, based on 'a highly developed communicative infrastructure of *possible* forms of life' (Habermas 1989: 69). In contrast, Lacau and Mouffe stress the importance of the chance event and the contingent, or, as Smith has put it, 'instead of an end-point, we have an infinite series of contestations, and the role of the theorist is to incite these' (Smith 1998: 23). Thus, radical democratic theory, which might traditionally have been associated with utopian thinking and social engineering, now 'rejects teleologies, 'scientific' predictions and eschatological prophecies' (1998: 24). On this point, where Laclau and Mouffe differ from Lyotard is that they advocate a linking or an articulation of language games into a 'hegemony'.

#### **Ocularcentrism Inverted**

In this section we introduce a framework that provides a useful understanding of how postmodernism – or at least one strand of postmodernism – has effectively inverted the very basis of the ocularcentric paradigm. In particular, it is arguable that postmodernity has witnessed a profound change in the relative understanding of the Platonic-Cartesian

distinction between the world as seen by the eyes on one's head (e-vision) and the world of the mind's eye (m-vision). In the modern period, which we can approximate as spanning from 1600 to 1900, m-vision (which loosely equates to the theoretical world) was understood as pure in contrast to the impurity of the visual world, e-vision (see Figure 2 above).

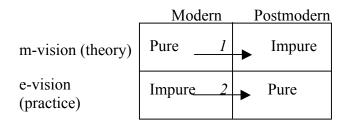


Figure 3. The double inversion of ocularcentrism

As Figure 3 shows, postmodernity is characterised by an interesting double inversion (shown as 1 and 2 in the figure). In this section we will briefly discuss each of these.

The first inversion shows how the modern understanding of theoretical purity – which we can trace to Platonic idealism – has effectively been replaced to the point where clarity of thought is no longer afforded primacy in theoretical discourse. Symptomatic of this shift is the introduction of a large catalogue of terms that emphasise impurity and the repudiation of any theory based on fixed essences or pure Truth. Thus, Derrida has employed a vocabulary of terms like 'différence', 'supplementarity', 'trace', 'deconstruction', and 'decentring', to emphasise the instability, ambiguity or impurity of language. Likewise, Rorty (1989) uses the concept of 'irony' to stress the contingency of all beliefs and concepts, while Foucault and others have shown how the project of modernity, far from creating a society that was transparent to its members, has actually

created a carceral, irrational society. Grant (1993: viii-ix), the translator of Lyotard's *Libidinal Economy*, put it quite well when he gave the following explanation of why Lyotard's work was so unclear and difficult to understand:

It is at precisely these points of narrative breakdown (cata-hexes) that Lyotard's vertiginous text is articulated by the accelerating aleatory sweep of the tensor sign, sketching the very ephemerality of its ungraspable flight.

The cumulative effect of these and other writings is that we now have, in terms of theory, what Habermas (1989) refers to as a 'new obscurity'.

The second inversion is the translation of e-vision, the world of practice, from the impurity of the modern era to the purity of the postmodern (shown as translation 2 in figure 3). As discussed earlier, the moderns were hostile to the illusory nature of the visible world (i.e. they understood it as imperfect), and consequently their utopias were very much fictions, located in the imaginary (m-vision). Many of the postmoderns, in contrast, assert that the world has come to the end of history and that now, in effect, is the postmodern meta-utopia (a meta-utopia being an environment wherein different utopian visions are permitted). According to some marketing scholars (see, for instance, the collection edited by Brown, Doherty and Clarke (1998)), marketing has been central to this project of creating contemporary utopias, since its very essence is the development, dissemination and manipulation of image:

With its boundless ability to invent 'imaginary worlds of perfect appearances, perfect personal relationships, perfect families, perfect personalities, perfect careers, perfect holidays, perfect pizzas, perfect personalities and perfect imperfections' (Brown 1995: 137), marketing, more than any other contemporary cultural institution, is arguably the keeper of the late-twentieth-century utopian flame. (Brown and MacLaren 1996: 266)

Martins (1995: 51) makes much the same point when she says that:

... in the absence of stronger illusions, the public needs to invest its dreams somewhere. Replacing other vendors of illusions that progress has dislodged from their traditional positions, advertising appears at the right time to fill the vacuum.

Thus, in some respects, we can understand postmodernism as romanticism without vision (Livingston 1997; Power and Stern 1998). Similarly, Belk (1996: 93) asserts that '[o]ur primary source of hope has shifted from religion, to art and science, and finally to consumption' and that 'we must face the fact that for many of us, perhaps all of us in one way or another, some of our strongest and most readily available hopes for transcendent and transformational experiences lie in consumer goods and services' (1996: 102). According to Baudrillard, America is the ultimate consumer world which he, appropriately, sees as a 'paradise', albeit a 'mournful, monotonous and superficial' paradise (Baudrillard 1989: 98). In this non-teleological world we have no future vision but live instead in the perpetual present: like the traffic on America's freeways we are 'coming from nowhere, going nowhere' (1989: 125). Elsewhere he argues that as we draw upon and use all of our resources, we only end up destroying 'metaphors, dreams, illusions and utopias by their absolute realization' (Baudrillard 1994: 102). For Baudrillard, the complete clarity of the postmodern world, where everything is filmed, broadcast, videotaped, etc., is obscene, because it leaves the totality of the world exhibited and visible. Instead, he prefers the *scene* that involves both absence and illusion: '[f]or something to be meaningful, there has to be a scene, there has to be an illusion, a minimum of illusion, of imaginary moment, of defiance of the real, which carries you off, seduces or revolts you' (Baudrillard and Fleming 1990: 65).

26

#### Reflections

Notwithstanding the extensive criticisms of Enlightenment rationality and ocularcentrism, summarised above, the evidence is that the ocularcentric paradigm is now stronger than ever. New information and communication technologies permit spectacularisations that have not been possible before (Baudrillard 1983; Vattimo 1992; Debord [1967] 1983). Globalisation and just-in-time production, which are both predicated on the existence of intensive surveillance and supervisory technologies, constitute a form of electronic panoptica. The privileging of vision in strategic management as the insight that takes over when foresight is limited. The prevalence of fervent nationalism, indicating that teleological metanarratives based on a 'fixed point of view' still provide a pervasive and potent organising logic across the world. The colonisation of new locales and discourses by Western thought - with its attendant practices of objectification and subjectification – creating what Power (1999) has referred to as an *audit society* that seeks to make everything visible. It is clear that, no more than nuclear technology can be 'unlearned', one cannot simply drop-kick Western philosophy into oblivion because one is uneasy about its ocularcentrism. Likewise, this text is peppered with the language of a spectatorial epistemology – aspect, insight, points of view, perspective, clear, see, focus, etc. – although if we were to dispense with this language totally we would probably be either silent or unintelligible. The lesson, maybe, is that it is just as inappropriate to dismiss the vision metaphor – which would be impossible anyway – as to be transfixed by it.

With regard to the framework presented in this paper, a number of caveats are in order. First, each of the three different trajectories can and has been critiqued. For instance, the thesis that utopia is actualised in the hyper-reality of contemporary consumption is scarcely adequate, since, while it may describe the life-style of some (mainly white) middle class subjects, it hardly describes the life of the poorer and disenfranchised sections of society. Second, one might usefully ask where the framework is itself located in terms of its relationship to ocularcentrism. The framework, with its visual-spatial 'trajectories' is surely a good example of what Bauman (1991: 189) refers to as the 'gardening' ambitions of modernity, wherein *clear* categorisation is celebrated. In response, it is worth emphasising that ocularcentrism and its three 'Others' are not paradigms à la the four incommensurate paradigms presented by Burrell and Morgan (1979), on the basis that it makes little sense to invest metatheoretical boundaries with theological significance. Thus, overlap is to be expected and there is no claim that the classification is either exclusive or exhaustive (after all, the three trajectories share a common thread: they are all oculacentrism's 'Others'). Instead, the framework is better understood as a set of vantage points that are relatively rather than absolutely meaningful. By adopting different vantage points we can come to understand our discourse in new and interesting ways through considering and reflecting on the metaphors that are privileged and excluded.

Ocular metaphors are privileged in organisational discourse, not just in terms of epistemology and methodology, but also in terms of constructs that filter straight through to management thinking (for example the notion of organizational vision). It is not that this way of thinking about the world is deficient, but rather that it is clearly partial. The implication is that there is significant potential for the other senses to contribute, in terms of pedagogy, research methods and modes of results dissemination, to organization studies. This echoes similar calls in the nascent literature of organizational aesthetics – where Antonio Strati has suggested that 'smell sheds light [*sic*] on an aspect that the organizational literature habitually ignores' (Strati 2000: 17) – and in the literature on emotion and organisations – where emotion is presented as a new, more sensual, mode of inquiry that is at odds with the cognitivist paradigm in organization studies (Fineman 1996). At the very least, the ideas and framework introduced in this paper should stimulate a deeper understanding of debates and positions in organization theory, and the limitations and exclusions created by the ocular metaphors on which our own contribution to discourse is based. Of course one should not expect radical change, at least in the short term, since our current practices and preferred meta-metaphors are the sedimented effect of ancient institutionalising practices. Nevertheless, the conjunction of similar arguments across disparate discourses suggests that metaphors based on sight and light will have a diminished role in the future of our discipline. We shall see.

#### References

- Abrams, M. H. 1953 *The mirror and the lamp: Romantic theory and the critical tradition.* New York: Oxford University Press.
- Arendt, Hannah 1978 *The life of the mind/thinking*. New York: Harcourt Brace Jovanovich.
- Barnard, Chestar 1938 *The functions of the executive*. Cambridge, Mass.: Harvard University Press.
- Barnes, Barry and David Bloor 1982 'Relativism, rationalism and the sociology of knowledge' in *Rationality and relativism*. M. Hollis and S. Lukes (eds.), 21-47. Oxford: Basil Blackwell.

Baudrillard, Jean 1983 Simulations. New York: Semiotexte.

- Baudrillard, Jean 1989 America. London: Verso.
- Baudrillard, Jean 1994 The illusion of the end. Cambridge: Blackwell.

Baudrillard, Jean and Jim Fleming 1990 *Fatal strategies*. New York: Semiotext(e).Bauman, Zygmunt 1991 *Modernity and ambivalence*. Cambridge: Polity Press.

Belk, Russell W. 1996 'On aura, illusion, escape, and hope in apocalyptic consumption: The apotheosis of Las Vegas' in *Marketing apocalypse: Eschatology, escapology and the illusion of the end.* S. Brown, J. Bell, and D. Carson (eds.), 87-107. London: Routledge.

Berger, John 1972 Ways of seeing. London: BBC and Penguin.

- Bergson, Henri and Frank Lubecki Pogson [1889] 1971 *Time and free will: An essay on the immediate data of consciousness.* London: Allen & Unwin.
- Brennan, Teresa and Martin Jay 1996 Vision in context: Historical and contemporary perspectives on sight. New York: Routledge.

Brown, Stephen 1995 Postmodern marketing. London: Routledge.

- Brown, Stephen, Anne-Marie Doherty, and Bill Clarke 1998 *Romancing the market*. London: Routledge.
- Brown, Stephen and Pauline MacLaran 1996 'The future is past' in *Marketing apocalypse: Eschatology, escapology and the illusion of the end.* S. Brown, J. Bell, and D. Carson (eds.), 260-277. London: Routledge.
- Bruner, Jerome S. 1986 Actual minds, possible worlds. London Cambridge, Mass.: Harvard U.P.
- Burrell, Gibson and Gareth Morgan 1979 Sociological paradigms and organisational analysis. London: Heinemann.
- Chia, Robert 1995 'From modern to postmodern organizational analysis'. *Organization Studies* 16/4: 579-604.
- Cooper, Robert and John Law 1995 'Organisation: Distal and proximal views'. *Research in the Sociology of Organisations* 13: 237-274.
- Czarniawska-Joerges, Barbara 1998 *A narrative approach to organization studies*. Thousand Oaks, Calif.: Sage.

Debord, Guy [1967] 1983 Society of the spectacle. Detroit: Black & Red.

Deetz, Stanley 1996 'Describing differences in approaches to organizational science:
Rethinking Burrell and Morgan and their legac'. *Organization Science* 7/2: 191-207.
Derrida, Jacques 1978 *Writing and difference*. London: Routledge & Kegan Paul.

- Descartes, René and Paul J. Olscamp 1965 *Discourse on method, optics, geometry, and meteorology*. Indianapolis,: Bobbs-Merrill.
- Fineman, Stephen 1996 'Emotion and organizing' in *Handbook of Organization Studies*.S. Clegg, C. Hardy, and W. Nord (eds.), 543-564. London: Sage.
- Flynn, Thomas R. 1993 'Foucault and the eclipse of vision' in *Modernity and the hegemony of vision*. D. M. Levin (ed.), 273-286. Berkeley: University of California Press.
- Foucault, Michel 1973 *The birth of the clinic: An archaelogy of medical perception*. New York: Random House Vintage Books.
- Foucault, Michel and Colin Gordon 1980 Power/knowledge selected interviews and other writings 1972-1977. Brighton: Harvester.
- Gabriel, Yiannis 2000 *Storytelling in organizations: facts, fictions, and fantasies*. Oxford: Oxford University Press.
- Giddens, Anthony 1994 *Beyond left and right: The future of radical politics*. Cambridge: Polity Press.
- Giddens, Anthony 1998 The third way. Cambridge: Polity.
- Grant, Ian Hamilton 1993 'Translator's preface' in *Libidinal economy*. J.-F. Lyotard (ed.), i-x. London: Athlone Press.
- Habermas, Jurgen 1989 'The new obscurity: The crisis of the welfare state and the exhaustion of utopian energies' in *The new conservativism: Cultural criticism and the historian's debate.* S. W. Nicholsen (ed.), 48-70. Cambridge MA: MIT Press.
- Harvey, David and Donna Haraway 1995 'Nature, politics, and possibilities: A debate and discussion with David Harvey and Donna Haraway'. *Environment and Planning D*, Society & Space 13/5: 507-527.
- Heidegger, Martin 1975 'The way back into the ground of metaphyics' in *Existentialism* from Dostoevsky to Sartre revised and expanded. W. A. Kaufmann (ed.), 206-221.New York: New American Library.
- Heidegger, Martin [1927] 1962 Being and time. Oxford: Basil Blackwell.

Heidegger, Martin [1981] 1993 Basic concepts. Bloomington: Indiana University Press.

Jay, Martin 1993a Downcast eyes: The denigration of vision in twentieth-century French thought. Berkeley: University of California Press.

- Jay, Martin 1993b 'Sartre, Merleau-Ponty, and the search for a new ontology of sight' in Modernity and the hegemony of vision. D. M. Levin (ed.), 143-185. Berkeley: University of California Press.
- Jonas, Hans 1966 'The nobility of sight: A study in the phenomenology of the senses' in *The phenonmenon of life: Towards a philosophical biology*. H. Jonas (ed.), 135-156. New York: Harper & Row.
- Jones, Howard Mumford 1974 Revolution and romanticism. Cambridge, MA: Belknap Press.
- Laclau, Ernesto and Chantal Mouffe 1985 *Hegemony and socialist strategy: Towards a radical democratic politics*. London: Verso.
- Lakoff, George and Mark Johnson 1980 *Metaphors we live by*. Chicago: University of Chicago Press.
- Levin, David Michael 1993a 'Introduction' in *Modernity and the hegemony of vision*. D.M. Levin (ed.), 1-29. Berkeley: University of California Press.
- Levin, David Michael *editor* 1993b *Modernity and the hegemony of vision*. Berkeley: University of California Press.
- Levin, David Michael 1997 Sites of vision: The discursive construction of sight in the history of philosophy. Cambridge, Mass.: MIT Press.
- Livingston, Ira 1997 Arrow of chaos: Romanticism and postmodernity. Minneapolis: University of Minnesota Press.
- MacKenzie, Iain 2001 'Unravelling the knots: Post-structuralism and other 'post-isms''. *Journal of Political Ideologies* 6/3: 331-345.
- Martins, Maria Cristina da Silva 1995 *Humor and eroticism in advertising*. San Diego: San Diego State University Press.
- McCumber, John 1993 'Derrida and the closure of vision' in *Modernity and the hegemony of vision*. D. M. Levin (ed.), 234-251. Berkeley: University of California Press.
- McLuhan, Marshall 1962 *The Gutenberg galaxy: The making of typographic man.* Toronto: University of Toronto Press.
- Merleau-Ponty, Maurice 1964 'Eye and mind' in *The primacy of perception*. J. M. Edie (ed.), 159-190. Evanston, Ill.: Northwestern University Press.

- Morgan, Gareth 1980 'Paradigms, metaphors, and puzzle solving in organization theory'. *Administrative Science Quarterly* 25/4: 605-622.
- Morgan, Gareth 1983 'More on metaphor: Why we cannot control tropes'. *Administrative Science Quarterly* 28/4: 601-607.
- Nietzsche, Friedrich [1887] 1969 On the genealogy of morals. New York: Vintage Books.
- Pfeffer, Jeffrey 1982 Organizations and organization theory. London: Pitman.
- Plato 1974 The Republic. London: Pan Books.
- Power, Michael 1999 *The audit society: rituals of verification*. Oxford: Oxford University Press.
- Power, Paul and Barbara B. Stern 1998 'Advertising illumination: Romantic roots of postmodern promises' in *Romancing the market*. S. Brown, A.-M. Doherty, and B. Clarke (eds.), 202-215. London: Routledge.
- Ritzer, George 1992 'Metatheorizing in sociology' in *Metatheorizing*. G. Ritzer (ed.), 7-23. London: Sage.
- Rorty, Richard 1979 *Philosophy and the mirror of nature*. Princeton: Princeton University Press.
- Rorty, Richard 1989 Contingency, irony and solidarity. Cambridge: Cambridge U.P.
- Smith, Anna Marie 1998 Laclau and Mouffe: the radical democratic imaginary. London: Routledge.
- Spivak, G. C. [1985] 1988 'Can the subaltern speak?' in *Marxism and the interpretation of culture*. C. Nelson and L. Grossberg (eds.), 271-313. Urbana: Univ. of Illinois Press.
- Strati, Antonio 2000 'The aesthetic approach in organization studies' in *The aesthetics of organizations*. S. Linstead and H. Höpfl (eds.), 13-34. London: Sage.
- Trimble, David 1998 *Nobel speech on receiving the Nobel Peace Prize*. Available on the web at http://www.nobel.se/peace/laureates/1998/trimble-lecture.html.
- Van Maanen, John 1988 *Tales of the field: On writing ethnography.* Chicago: University of Chicago Press.
- Vattimo, Gianni 1992 *The transparent society*. Baltimore: John Hopkins University Press.

- Whitehead, Alfred North 1929 *Process and reality: An essay in cosmology*. Cambridge: Cambridge U.P.
- Winner, Langdon 1993 'Upon opening the black box and finding it empty: Social constructivism and the philosophy of technology'. *Science, Technology and Human Values* 18/3: 362-378.

Woolgar, Steve editor 1988 Knowledge and reflexivity: New frontiers. London: Sage.