

'Nature', Childhood, and The Anthropocene: evaluating the challenges for Education Studies

David Blundell, London Metropolitan University

Email: d.blundell@londonmet.ac.uk

Abstract

This paper responds to the call for reflection on the future of Education Studies by considering possible impacts of the relatively recent proposition that we are living in The Anthropocene. Many scholars from multiple disciplines concerned with climate change now consider that the impact of humankind on the Earth and its systems is so pervasive that humans have become a telluric force with discernible and irreversible geological effects. This leads them to suggest that conventional distinctions between natural and human or cultural worlds found in Enlightenment modernity are no longer tenable. The paper explores some possible challenges that this collapse of nature into culture and vice versa might have for working assumptions concerning the naturalness of 'the child' and normatively constructed Childhood as underpinning for the institutional practices of schooling and as template around which policy is frequently framed. It concludes by discussing possibilities to understand children and their lives as social actors enmeshed in complex social and material networks and so to recognise the plurality of childhoods as responses to human biological immaturity. By circumventing the presumed naturalness of childhood, the paper aims to contribute to debates about the future of schooling and its institutions as the dominant means by which we seek to educate.

Keywords

Anthropocene, childhoods, nature, culture, modernity

Introduction

This is an extended version of a paper given at the 2016 annual conference of the British Education Studies Association addressing the conference theme of 'Education Studies: the next 10 years'. It proposes a direction for development of the curriculum that will almost certainly exceed that ten-year frame. Education Studies is still a discipline coming into being and has rightly sought to transcend its somewhat functionalist identity as teacher training by-other-means and as one amongst several

'pick-and-mix' degree subjects found in the neo-liberal Higher Education curriculum. One way in which to approach this is to seek a robust paradigmatic enframing within which teaching, research and scholarship within this multidisciplinary field can flourish and be rendered meaningful. Over recent years there has been a growing thematic interest in the field that has its origins in the sociology of childhood but due to the accretion of interest from, *inter alia*, human geographers, anthropologists, intellectual historians, philosophers, and social psychologists has become identified as a broad multi-disciplinary field called 'The New Social Studies of Childhood'. This paper seeks to articulate this interest in children's lives and the institutions of childhood – that Education Studies shares with several other cognate disciplinary areas – in relation to the challenges of climate change and particularly the proposition that we are now living in a geological epoch known as The Anthropocene, or 'the age of humans'. It argues that the Anthropocenic proposition presents challenges to those constructions of childhood, 'the child' and education that we inherit from enlightenment modernity, especially the place of Nature and the natural world. It suggests that The Anthropocene presents opportunities to recast and redirect Education Studies (and particularly its interest in childhood) as part of a scholarly conversation around all our futures that brings natural science, social sciences and humanities together and may be seen, with some degree of caution, as a resource of hope in what are and will be difficult times. I am indebted to the anonymous reviewers who offered valuable comments on the paper at the draft stage.

'Nature' and childhood - do children have a special relationship with the natural world?

Recent years have seen an upsurge in the popularity of the argument that children need exposure to nature as part of a properly appointed childhood, by which it is assumed proper development will be assured. The arguments, *inter alia*, of Richard Louv (2005), *The National Trust* (Moss, 2012), Maitland (2012), and *Wildness University* (2016) propose not just that proper development can be assured when the external natural world is brought into harmonious alignment with children's internal nature, and *vice versa*, but also that when this is absent or denied violent harm is done to the child that may well explain the later emergence of any number of individual pathologies and social ills. The concept of *wilderness* is frequently to be found at the heart of these convictions because it seems to represent the ideal material conditions found when humans are extracted from the environment and natural history presides without the trickier congeries of human or cultural history. As a pure form, wilderness finds its complement and counterpart either in conceptions of childhood moral

innocence or the child as *tabula rasa* and thus respectively informs ideal, universal and naturalised phenotypes for the human subject.

The idea that children are closer to nature than adults can perhaps most explicitly be found in Jean Jacques Rousseau's *Emile: ou de l'éducation*, published in 1762 almost simultaneously with *The Social Contract*. As a treatise on human nature, the former used the child Emile as avatar for philosophical rumination, whilst the latter presented a philosophical discourse on society and political order. It is intriguing to imagine Rousseau sitting down to reflect on the content of these two great works separately, but also on how he might have imagined overlaps between them. In *Emile*, the child in all his new-minted freshness represents human beings in a natural condition that is antithetical to the corrupt world of society and the adult world. For Rousseau the child's natural innocence is something to protect for as long as possible until the anxious condition he identifies as *amour propre* insinuates itself and adult social sensibilities take over, as he says: "Nature wants children to be children before they are men". Furthermore, in contrast to the powerful Church doctrine of Original Sin, Rousseau declares that Emile is born as a moral innocent with a natural and unselfconscious disposition to do good. Rousseau expresses the tension between innate virtue and social turpitude by describing a form of education that allows Emile's natural curiosity to flourish, albeit under the subtle direction of his teacher where sense, intuition, and direct experience are preferred over books and direct instruction:

"Let the senses be the only guide for the first workings of reason. No book but the world, no teaching but that of fact. The child who reads ceases to think he only reads. He is acquiring words not knowledge ... Put problems before him and let him solve them himself. Let him know nothing because you have told him, but because he has learnt it for himself. Let him not be taught science, let him discover it. If ever you substitute authority for reason he will cease to reason; he will be a mere plaything of other people's thoughts." (Rousseau, 1762 and 2005 p.376).

Rousseau's work struck a rich chord with others, particularly Immanuel Kant as a progenitor of German philosophical idealism and with the educators Johann Pestalozzi and Frederick Fröbel whose work was shaped by both. In this passage, Pestalozzi adopts a rhetorical scepticism about faddish pedagogical tricks that is worthy of Rousseau and his championing of a natural pedagogy:

"I wish to wrest education from the outworn order of doddering old teaching hacks as well as from the new-fangled order of cheap, artificial teaching

tricks, and entrust it to the eternal powers of nature herself, to the light which God has kindled and kept alive in the hearts of fathers and mothers, to the interests of parents who desire their children grow up in favour with God and with men." (Kilpatrick, 1951; Blundell, 2012: 41)

There is a sense in which both *The Social Contract* and *Emile* can be read as strictly philosophical and political treatises, but it is undoubtedly the case that the latter is just as likely to be read because of its inspirational impact on educators and others concerned with children and childhood. Indeed, for this reason Rousseau can be regarded as a primary contributor to the construction of what we shall call 'modern childhood', that is the particular way of seeing children and childhood that arose under the conditions of early modernity, commonly known as the European Enlightenment and is congruent not only with an emerging age of secular humanism but also with the concern to establish foundations for human knowledge that did not rely on Church dogma. For Rousseau, the idea of Nature provided just such a foundation. This challenged long-held moral constructions found in St. Augustine of Hippo of nature as, at best, to be distrusted and the child as intrinsically evil – as a consequence the Archbishop of Paris had the book publicly burned. However, the ideas contained within Rousseau's work were not consumed along with his books and they inspired attempts by enthusiastic disciples - such as Richard and Maria Lovell Edgworth, William Cadogan, Pestalozzi and Froebel - to realise them in practice.

Rousseau's championing of Nature reflected a wider interest amongst Enlightenment humanist *philosophes*. However, this is not to say that Modernity's construction of nature was straightforward; indeed, it can be seen as deeply conflicted in ways that continue to frustrate and confuse thinking and actions in the educational sphere. This is a point underlined by Raymond Williams in 'Keywords' (1988: 219-224), where he asserts that "*Nature is perhaps the most complex word in the language*". Tracing the genealogy of the concept, Williams sees two distinguishable, albeit at times overlapping, senses emerging from the Enlightenment that have significance for our interest in modern childhood. First, he suggests the Enlightenment sees the emergence of an understanding of "*nature as the material world. But the emphasis on discoverable laws ... led to a common identification of Nature with Reason*". Williams exemplifies this by reference to Alexander Pope's celebration of Newton as discoverer of otherwise occulted natural physical laws: "*Nature and Nature's laws lay hid in night; God said, Let Newton be! And all was light!*" This, Williams suggests, objectified Nature and marked it out as distinct from the human world of cultural artefacts. In turn, this objectification of nature encouraged a second moral disposition

that served to indict the shortcomings of the human or cultural world. As Williams has it:

“The ‘state of nature’, and the newly personified idea of Nature ... played critical roles in arguments about, first, an obsolete or corrupt society, needing redemption and renewal, and, second, an ‘artificial’ or ‘mechanical’ society, which learning from Nature must cure.” (Williams, 1988).

In the succeeding century this view of Nature as source of virtue is compounded by North American Romantics, including Henry David Thoreau in *the Maine Woods* and Ralph Waldo Emerson at *Walden Pond*, who saw in the forests, mountains and deserts of the New World opportunities for renewal and a redemptive cure for increasingly artificial and mechanical societies. The proto-environmentalist John Muir took up their lead as founder of the American National Parks movement whose celebration of wilderness has, in the view of Bruno Latour (2004: 5), been crucial in consolidating the currency of this strand of sensibility about Nature. Furthermore, this not merely reinforced the discourse of Nature as a moral commentator on the social world, but established an assumption that the natural world had a capacity to perform what he calls “work of purification” – a capacity that in association with the assumed special relation between children and the natural world becomes intimately bound up with constructing ‘the child’ as a *redemptive vehicle* - to use Moss and Petrie’s expression (Moss and Petrie, 2002: 58-61; Latour 1993: 10-11; and Taylor 2014: 11). We shall return to the idea of wilderness and what some researchers increasingly see as its problems later on.

Rousseau’s work is, in part, a response to the English philosopher John Locke who wrote copiously about children and their care and proper upbringing. For Locke, children were neither intrinsically good nor evil; rather, in line with his empiricism, they are born morally neutral. However, this neutral formlessness also meant that, like water, their character flowed with purpose when directed but every which way when not. Whereas for Locke children’s being should be subordinated to what they are to become, for Rousseau children’s being should be protected so that they become better adults. However each in different ways justifies their conviction by reference to the nature of children and, thereby, relies on naturalised constructions of childhood.

If Locke and Rousseau offer seminal contributions to the construction of modern childhood, then they also embody and illustrate oppositional sides of the same coin that is modernity. On the one hand there is Locke’s technical rationalism, wherein reason must take precedence over desire:

“It seems plain to me, that the Principle of all Vertue and Excellency lies in the power of denying ourselves the satisfaction of our own Desires, where Reason does not authorize them.” (Locke, 1693 in Cunningham, 2006 p.111)

On the other hand stands the Romantic Rousseau and his trust in ‘Nature’ as the child’s guide. This dualistic dispute between Locke as technical rationalist and Rousseau’s romanticism is not confined to childhood or education, but reflects deep and complex differences running through modernity’s project. For the technical rationalists, nature is a rich store imbued with potent reproductive potential to be harnessed to engineer human ends; for romantics, nature offers moral and spiritual redemption through its sublime authenticity. Following Rousseau’s as well as Locke’s lead, modern childhood’s prescriptions for children’s lives shape philosophical and practical understandings of what is meant by ‘proper education’, so that education becomes a site for contest between different discourses. On the one hand children’s nature may be seen as wayward, chaotic and disordered – identified by the discourse of the Dionysian child in Chris Jenks’ (2005) terms – and the great end of education is to socialize through the discipline of programmes of study, SATs, PISA and didactic curricula (Blundell, 2014; Abegglen and Blundell, 2016 in preparation). On the other, modern childhood also holds that children’s nature should be recognised as pure, innocent and in need of protection – the discourse of the Apollonian child (again Jenks 2004) - so that the aim of education should be to facilitate and preserve childhood for as long as possible through, for example, child-centred methodologies.

Why might the proposition that the Earth has entered The Anthropocene challenge ways of seeing ‘Nature’ bequeathed us by The Enlightenment?

It is at this point that I want to introduce a proposition advanced by Earth and climate scientists and that is gaining acceptance across a broad multi-disciplinary front that includes archaeologists, anthropologists, human geographers, economists, historians and other social scientists. I argue that its potential to transform thinking in the environmental sciences and humanities can also open up our thinking about children and childhood in a globalising world and offer a way out of the unhelpful impasse. This is the proposition that the scale of human intervention over the past 250 years or longer has been such that humankind has become a telluric force shaping, directing and modifying the Earth system and its processes to a point where the changes humans have made and are making are irreversible. This has led to the proposition that the

Earth is not now in the geological epoch that began around 12,000 years ago known as the Holocene, but has entered the 'epoch of the humans', imaginatively dubbed the *Anthropocene* by an atmospheric scientist named Paul Crutzen in 2000 (Crutzen, 2002). Debate and dispute surrounds the onset of this new epoch (currently being assessed by the International Stratigraphic Commission that arbitrates on geological time): some contend this is as recent as atomic bomb tests after 1945; others, link it to Watt and Boulton harnessing steam power in 1763 that ushered in the carbon economy; others still cite the emergence of farming some 12-15,000 years ago; whilst there are exponents of the view that The Anthropocene begins much earlier with the first use of fire by hunter-gatherer humans to control landscapes and food supplies (see Dukes, 2010; Bonneuil, 2015; Bonneuil and Fressoz, 2016 for respective arguments and claims).

The proposition that we are now in the Anthropocene is, however, profoundly linked to the challenges of climate change contingent on increases in atmospheric CO₂ and its potential transformation of atmosphere, oceans, land and biospheres that comprise the Earth system. The suggestion that it could take centuries or millennia to reverse the effects of the 575 billion tons of CO₂ released since the 1870s to return to the levels of the early Holocene – let alone accommodate continuing emissions - means that the plan to confine global warming to a mere 4 degree C rise by the end of the century looks increasingly optimistic (Hamilton et al, 2014: 4). All in all, the full effects of climate change not merely on land, ice and sea distribution, soil fertility, environmental change and species extinction but also on economic sustainability, human conflict, and resultant mass human migration are yet to be felt.

These may be matters that emanate from the geological and Earth sciences, but they are being explored across a wide inter-disciplinary front that includes social sciences and humanities. So that, as much as the Anthropocene can be seen as a state of affairs to be addressed through scientific knowledge and research, it also has the potential to challenge conventional ways of seeing those constructions of nature found at the heart of Enlightenment modernity and confront its contradictory positions.

The catalytic effect of The Anthropocenic proposition can be illustrated in the way that it unsettles established ways of thinking about time that we inherit from modernity; specifically, that distinctions between human time (history) and natural or Earth time (geology) now become less clear. Hamilton *et al.* make the case for an Anthropocenic effect on our construction of time, as follows:

“From the time of the Bible up to that of the Comte de Buffon, the great French naturalist of the late eighteenth century, human history was understood as largely commensurable with the history of the Earth itself. But within decades after Buffon, just as the rise of a new industrial order paved the way for the Anthropocene, a deep divide opened up between the history of humankind and the history of the Earth. For the geologist Charles Lyell, writing in 1830, an intelligent being arriving from another planet would look upon the Earth and ‘soon perceive that no one of the fixed and constant laws of the animate or inanimate world was subverted by human agency ... [And that] whenever the power of the new agent was withheld, even for a brief period, a relapse would take place to the ancient state of things.” (Lyell, 1830: 164 cited in Hamilton, Bonneuil and Gemenne, 2015: 5-6)

Through this coming together of Earth or natural time and human time the Anthropocene proposes that rigid and dualistically separated notions of nature and human culture are increasingly difficult, if not impossible, to sustain. Instead it invites a re-imagination of the relationship between them as one of complex entanglement; so that, following Latour (2004), it now makes sense to speak of the Earth system as comprising a diversity of nature-culture hybrids rather than a non-negotiable ‘Nature’ with all its implied fixity.

Examples drawn from archaeology and environmental history illustrate this entanglement and suggest that The Anthropocene concept challenges the core conviction that pure nature is to be found in wilderness. As Affrica Taylor highlights, indigenous Australian scholar Marcia Langton proposes that wilderness, expressed through the concept of *terra nullius* was a legal manoeuvre designed to render aboriginal communities invisible and de-humanised, thereby making the land available for exploitation (Langton, 1996 and in Taylor, 2008, 2009, 2011; see also Cronon, 1998). By contrast, Langton argues that the landscape was always peopled and shaped, in part, by that human presence. In South America, archaeological research in the Amazon basin reveals evidence for extensive agricultural activity prior to 1492 and the Columbian encounter. This suggests that much of what is regarded as iconic, pristine virginal rainforest is, in actuality, regrowth (Bush, McMichael, Piperno, Silman, Barlow, Peres, Power and Palace, 2015; Wade, 2014). Meanwhile, historical research in North America presents evidence that much of the very forest eulogised as pure and virginal by Thoreau, Emerson and Muir was also regrowth that followed the post-1492 Native American encounter with Europeans and the ensuing collapse of

populations and agronomy due to war, disease and forced labour. This is being linked to climatic changes in surprising ways; as Bonneuil and Fressoz write:

“... it is well established today that the little ice age, the cooling of the climate between 1450 and 1800 with a minimum in the period of 1640-1730, was not simply a natural development experienced by human societies, but the product of a reciprocal interaction. If a cyclical reduction in solar activity was one factor involved, human action itself was another: the demographic collapse of the Amerindian population by some 50 million after 1492 led to an extension of the forests and a fall in atmospheric CO₂, hence a reduction in the greenhouse effect.” (Bonneuil and Fressoz, 2016: 38-9)

Whatever the debates about the date at which The Anthropocene began, these examples suggest that ‘natural’ landscapes and ecosystems are shot through with human agency, and have been over hundreds of years; so that the wilderness concept stands in need of re-evaluation.

Does The Anthropocene have implications for our thinking about children, childhood and education?

If our conception of nature, epitomised as wilderness, is no longer tenable, does this lead us to see the natural world as socially constructed through human discourse, and is childhood simply a social construction? The social constructionist position on childhood was most clearly articulated by Allison James and Alan Prout in their seminal and highly influential *New Paradigm for the Sociological Study of Childhood* published in 1990 and then 1997, before re-publication in 2014 as a classic work of sociological theory. The New Paradigm set out six propositions intended to shape and guide critical study and research on childhood. From this benchmark, the emergent field has grown to embrace anthropologists, cultural theorists, human geographers, sociologists and its impact has been not merely to make childhood a matter for academic curiosity and political discussion but also to secure children’s rightful place as active participants in those discussions. Thereby, it has sought to deconstruct dominant and dominating accounts of childhood and particularly their reliance on those monolithic, non-negotiable constructions of nature found in developmentalism, whether they be rooted in the technical rationalism of, say, brain research, or the romanticism of the various re-wilding childhood movements. Here is what the sociologist Alan Prout and anthropologist Allison James claimed about relations between nature, culture, children, and childhood:

“The immaturity of children is a biological fact of life but the ways in which this immaturity is understood and made meaningful is a fact of culture. It is these ‘facts of culture’ which may vary and which may be said to make of childhood a social institution. It is in this sense, therefore, that one can talk of the social construction of childhood and also ... of its re- and deconstruction. In this double sense, then, childhood is both constructed and reconstructed both for children and by children.” (Prout and James, 1997 p.7)

Thus the authors sought to circumvent the naturalisation of childhood, by locating it within the realm of culture, thereby acknowledging and accommodating difference. In the second proposition of this New Paradigm Prout and James locate childhood as an intersected, sociological condition:

“Childhood is a variable of social analysis. It can never be entirely divorced from other variables such as class, gender, or ethnicity. Comparative and cross-cultural analysis reveals a variety of childhoods rather than a single and universal phenomenon” (Ibid).

However, this attempt to recognise childhood as a social artefact constructed through discourse and thereby to re-construct a plurality of childhoods relied on a relationship between facts and their value-based interpretation that seemed to diminish the significance of differences that distinguish biological maturity from immaturity (i.e. being ‘adult’ or ‘child’), preferring to stress relativistic cultural differences. In consequence, Alan Prout (2005) - co-author of the original New Paradigm - recognised the shortcomings of social constructionism and its inability to banish naturalising accounts for childhood. In his view, this was because suggesting that childhood could be explained principally in terms of discourse, it failed adequately to take account of or accommodate those material, biological facts that are the bedrock for developmentalist arguments. In terms of the familiar, but rather clichéd, nature v. nurture binary, Prout came to the conclusion that social constructionism merely served to reinforce the ‘nurture’ side of the binary and left ‘nature’ largely untouched. In consequence, social constructionism not only left the binary unresolved, but may have reinforced it.

This stubbornly dualistic position has been reinforced by changes in the policy environment; whereby, the social constructionist’s propositions coincided with the recrudescence of developmentalism and its naturalising narratives in the wake of Sure Start and ‘Every Child Matters’ in association with the 2004 Children Act in the UK

(DfES, 2003, 2004a, 2004b) and 'No Child Left Behind' in the USA. So that the requirement to up-skill and educate a rapidly expanding children's workforce has reinforced the very dualism that the New Social Studies of Childhood sought to circumvent. Furthermore, it should be said that this has coincided with the flurry of popular publishing interest advancing the claims of those who argue for the existence of Nature-Deficit Disorder or speak of 'Toxic Childhood' amongst others (Louv, 2005; Moss, 2012; Palmer, 2006).

Recognising this, Prout sought to challenge the nature-culture dualism and its appearance as developmentalism v. social constructionism by demonstrating the ways that nature and culture are not only interwoven but also in dynamic relation to technology and technological changes; he does this by looking at what are challenging, hard-case examples, including: the realistic possibilities found in genetic technologies to design babies; the implications of sophisticated psychopharmaceuticals to enhance cognitive function and not merely treat disorders; and, information technologies to transform access to information as well as its processing, storage and transmission. In an approach owing much to the work of Gilles Deleuze and Felix Guattari, Prout proposes that the singular universal and naturalised category of childhood be replaced by *childhoods* understood as dynamically configured, diverse and entangled assemblages of natural, cultural and technological elements. Furthermore, and by no means as a marginal aside, the fact that nine-tenths of the world's children do not live in Western societies where Eurocentric presumptions are the norm – even though frequently imposed through global agencies – means that modern childhood may increasingly fail to fit the facts for many of the world's children.

Prout's work aligns with Australian geographer and Early Childhood activist Affrica Taylor's concern that failure to address the nature-nurture dualism through social constructionism should not lead to a 'zig-zag' back to nature. Taylor draws on the work of radical feminists, such as Donna Haraway to outline an approach to understanding and valuing the lives and experiences of children, such as those from native Australian communities, that does not rely on Western or Eurocentric essentialising constructions either of nature or of culture. She takes up the call by challenging what she sees as the naturalisation of childhood found in these constructions and the essentialist assertion that there exists a special relationship between children and the natural world; she does this by questioning the 'nature of nature' itself. She writes:

"For my purposes, the claim that 'There is no natural or evolutionary child' is significant because it explicitly challenges the assumption that there is an

a priori 'special relationship' between childhood and nature. My contribution to the body of work that sets out to denaturalize childhood is to interrogate the often essentialized and valorized 'special relationship' between children and nature. This involves not only interrogating the essentialized nature of childhood but also the essentialized nature of nature." (Taylor, 2011, 2014; Blundell, 2016, 2017)

Taylor works with young children in remote native Australian communities whose cultural references are very different from the recent settler population and whose perspectives can be linked to discriminatory and highly prejudicial constructions of human nature to which Aboriginal people and their communities have been subjected. The assertion that children need nature has become commonplace, but should we ask which children? and whether beneath this common-sense claim lies a Eurocentric trope for 'the child' that is far from universal in its meaning and currency – especially in the majority world for children like those with whom Affrica Taylor works. For Taylor, naturalised accounts of childhood based on Eurocentric norms are not only insufficient to meet the educational needs of these children, but also discriminatory and oppressive through their appeal to nature as a non-negotiable, universal. This is why she seeks to de-naturalise not only childhood, but 'the essentialised nature of nature' itself. Taylor's work offers an example with clear differences to the situation in a wealthy Western country such as the UK, but to what extent do our educational practices continue to rely on naturalised and naturalising notions of gender, ethnicity, social class along with ability, intelligence, development, growth, needs, significant differences etc. that become silted into the institutional structures we ask children and teachers to live and work within and that may be at odds with the lives of learners as social actors? Taken together, Alan Prout and Affrica Taylor offer challenges to our understanding of childhood that facilitate possible reconfigurations in the position and experience of biologically immature humans that may be more appropriately aligned with the conditions found in a globalising world marked by difference and uncharted intercultural encounters.

Conclusion

Considering the potential impact of The Anthropocene on education at large and Education Studies in particular, there is a very obvious sense that it might provide fresh approaches to enframe knowledge and curricula concerned with environmental education, education for sustainability, ecology etc. Furthermore, that having proposed a case for the necessity of a trans-disciplinary approach embracing natural

sciences, humanities and social sciences, the potential to reproduce this in integrated approaches to curriculum research and construction seems clear: this is familiar territory for the assimilation of new knowledge within curricula and can be seen as an *epistemological* impact of the Anthropocenic proposition. However, as I have tried to illustrate, the concept of The Anthropocene may have more radical and further reaching impact than this, because it also offers an ontological challenge to modernity's working assumptions about Nature, culture, and relations between them that impact crucially on the day-to-day practices shaping the lives of children and young people in institutional settings. By shining a light on naturalised presumptions about children, childhood, and the human subject, the declaration that we now inhabit The Anthropocene may help the many dedicated professionals committed to inclusion, diversity, and the recognition of difference as they challenge normative institutional practices. In this, The Anthropocene presents an exciting and vital focus for Education Studies that can direct its mission as it plays a part in squaring up not only to the challenges of our relations to the planet, but also to each over the next 10 years and beyond.

References

- Abegglen, S. Blundell, D. (2016) *European ideals, schooling and modern childhood: Deploying the template child* Isaacs, S., (Ed.) (2016 in press), European Social Problems: an introduction, London: Routledge
- Blundell, D. (2012) *Education and Constructions of Childhood* London, Continuum
- Blundell, D. *Education and childhood* chapter 7 in Isaacs, S., Blundell, D., Foley, A. Ginsberg, N. McDonough, B., Silverstone, D. Young, T. (2014) *Social Problems in the UK: an introduction*, London, Routledge
- Blundell, D. (2016), *Rethinking Children's Spaces and Places: attitudes in contemporary society* London, Bloomsbury
- Blundell, D. (2017) *Eurocentrism, Modern Childhood and Children's Globalised Lives in Race*, R. (2017 in press) *Advancing Multicultural Dialogues*, London, Palgrave MacMillan
- Bonneuil, C. *The geological turn: narratives of the Anthropocene* in Hamilton, C., Bonneuil, C. Gemenne, F. (2015), *The Anthropocene and the Global Environmental Crisis: rethinking modernity in a new epoch*, London, Routledge

Bonneuil, C. Fressoz, J-B. (2016), *The Shock of the Anthropocene: the Earth, history and us*, London, Verso

Bush, M.B. McMichael, C.H. Piperno, D.R., Silman M.R. Barlow, J. Peres, C.A. Power, M. Palace, M.W. (2015) Anthropogenic influence on Amazonian forests in pre-history: an ecological perspective *Journal of Biogeography* Iss.42: pp.2277-2288

The Children's Society, (2012), *The Good Childhood Report*
www.childrenssociety.org.uk (accessed 24.7.13)

Cronon, W. (1998) *The trouble with wilderness, or, getting back to the wrong nature* in Callicott JB and Nelson MP (eds.) *The Great New Wilderness Debate*, Athens and New York, University of Georgia Press

Crutzen, P.J. (2002) Geology of Mankind, *Nature* pp.415: 23

Cunningham, H. (2006) *The Invention of Childhood* London, BBC Books

DfES (2003) *Every Child Matters* Green Paper, London, HMSO

DfES (2004) *Every Child Matters: change for children*, London, HMSO

DfES (2004), *The Children Act 2004* London, HMSO

Dukes, P. (2010) *Minutes to Midnight: history and the Anthropocene era from 1763* London, Anthem Press

Hamilton, C. Bonneuil, C. Gemenne, F. (2015) *Thinking the Anthropocene* in
Hamilton, C. Bonneuil, C. Gemenne, F. (2015) *The Anthropocene and the Global Environmental Crisis: rethinking modernity in a new epoch* London: Routledge

Jenks, C. (2005) *Childhood* (2nd ed.) London, Routledge

Kilpatrick, W.H. (1951) *The Education of Man - Aphorisms*, New York, Philosophical Library

Langton, M. (1996) What do we mean by wilderness?: Wilderness and Terra Nullius in Australian art *The Sydney Papers*, Vol. 8 Iss.1 pp.10-31

Latour, B. (2004), *Politics of Nature: how to bring the sciences into democracy*, Cambridge, Mass. Harvard

Louv, R. (2005) *Last Child in the Woods: nature deficit disorder and what we can do about it* New York, Atlantic Books

- Maitland, S. (2012) *Gossip From the Forest: the tangled roots of our forests and fairytales* London, Granta
- Moss, P. Petrie, P. (2002) *From Children's Services to Children's Spaces: public policy, children and childhood* London, Routledge/Falmer
- Moss, S. (2012) *The Natural Childhood Report* London, The National Trust
- Palmer, S. (2006) *Toxic Childhood: how the modern world is damaging our children and what we can do about it* London, Orion
- Potter, D. (1984), *Blue Remembered Hills: actors edition* London, Samuel French
- Prout, A. (2005) *The Future of Childhood* London, Routledge
- Prout, A. James, A. (1997) *A new paradigm for the sociology of childhood? provenance, promise and problems* in James, A. and Prout, A., (eds. 2nd edition) *Constructing and Reconstructing Childhood: contemporary issues in the sociological study of childhood*, London, Routledge pp.7-32
- Rousseau, J.J. (1762 and 2005) *Emile* in Jean-Jacques Rousseau: selected writings, London, The Collector's Library of Essential Thinkers
- Taylor, A. (2009) *Re-theorising the 'nature' of childhood, AARE Conference Paper* University of Canberra <http://www.aare.edu.au/data/publications/2009/tay09993.pdf> (accessed 5.5.15)
- Taylor, A. (2011) Reconceptualising the 'nature' of childhood *Childhood: a Journal of Global Childhood Research* Vol.18 Iss.4 pp.120-30
- Taylor, A., (2013), *Reconfiguring the Natures of Childhood*, London: Routledge
- UNICEF (2008) *Child Poverty in Perspective: A comprehensive assessment of the lives and well-being of children and adolescents in the economically advanced nations* http://www.UNICEF-irc.org/publications/pdf/rc7_eng.pdf (accessed 3.11.10)
- UNICEF (2013) *Child well-being in rich countries: a comparative overview, Innocenti Report Card 11* Florence: UNICEF https://www.unicef-irc.org/publications/pdf/rc11_eng.pdf (accessed, 4.11.16)
- Wade, L. *Searching for the Amazon's Hidden Civilizations*
<http://www.sciencemag.org/2014/01/searching-amazons-hidden-civilizations>
(Accessed April, 2016)

Wild Child: Rewilding Childhood – 6 weeks' Nature connection program for children and their caregivers - <http://learn.wearewildness.com/p/wild-child-rewilding-childhood> (accessed 2.11.16)

Williams, R. (1988) *Keywords: a vocabulary of culture and society* London. Fontana