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Futures education: Case studies, theories and transformative speculations

Without a vision, the people perish (Proverbs, 29: 18)

This Special Issue of Futures offers a diverse range of papers from the international field of futures education. It focuses on examples of work in schools and universities as well as theoretical speculation about how the field of education itself might be transformed in the future. The terms futures education and educational futures are sometimes used interchangeably and a clarification of the key terms and categories used in this special issue is given below.

Futures studies is the term most commonly used for the broad academic field that futures education operates within. Futures studies theories, concepts, methods and tools are being taught in many universities around the world, at both undergraduate and postgraduate levels. Other terms used to describe work referred to as futures studies include: foresight, strategic foresight, prospective, long-range planning and futurology. It is not the purpose of this issue to explore futures studies per se but rather the field of futures education, which is taken here to have three main constituent parts.

Youth futures

This focuses on the views and visions of the future that young people hold. Research in this area has been growing since the 1970s and provides a vital context for understanding both how young people see themselves in regard to 'the future' and why 'futures' processes are so valuable for them. While most of this research has occurred in school settings, some has involved marginalized youth from outside the school system. Youth futures research has been extensively explored elsewhere and is, of course, in constant need of updating [1]. Page has demonstrated the importance of work in the early years of education where very young children are beginning to formulate their ideas about time and change [2]. While very different from adult notions they are beginning to explore a variety of possible futures through fantasy and play. Around the age of eight children are developing a more 'adult' view of the future, recognising that it can be a place of both promise and threat, locally and globally. At secondary level and beyond young people's hopes and fears for the future begin to reflect contemporary concerns in the media relating to environment, conflict and justice and the impact of such matters on their own lives and the lives of others [3].

Futures in education

This primarily refers to the teaching of futures concepts and processes in primary and secondary school, teacher education and higher education more generally. Whether young people are given the opportunity to develop a futures perspective on the world, locally or globally, is still often a missing element in the school curriculum [4]. A global literature review, undertaken in 2004, provides an overview of the state of play in schools at the time, including examples of good practice at primary and secondary levels [5,6] A variety of useful teaching materials have also been created for classroom use [7,8]. Fewer examples of work in teacher education are available but often partially present in subject areas such as global citizenship and education for sustainability [9].

Futures of education

This includes reflection on how education, at all levels, could or should develop in the future. Researchers in this area, work in at least three domains. Some focus on a critique of the dominant neoliberal 'business as usual'/industrial model of education. Amongst most mainstream educators this is the default view of the future and thus of education. Much



Introduction



educational thinking is based on tacit, token or taken for granted views of the future [10] which explicitly or more often implicitly draw on neoliberal ideology [11,12]. Other progressive and radical educators may engage in visioning preferable futures for education, both within and beyond the mainstream system. Some educational innovators argue that only a total shift in educational paradigm will suffice in the face of the global dilemmas that lie ahead [13]. From this perspective futures *of* education goes beyond teaching futures as just a part of the curriculum to a notion of long-term thinking and foresight as embedded in the underpinning educational philosophy.

Historically, as McHale points out, interest in the future is an integral element of the human condition [14, p. 5] since 'the idea of the future is one of the central symbols through which human beings have ordered their present and given meaning to their past.' Education should, therefore, have a crucial role to play in fostering the insights and skills that are needed in order to think critically and creatively about the future. Toffler, in his classic *Learning for Tomorrow: The role of the future in education* [15] writes:

All education springs from images of the future and all education creates images of the future. Thus all education, whether so intended or not, is a preparation for the future. Unless we understand the future for which we are preparing, we may do tragic damage to those we teach. Unless we understand the powerful psychological role played by images of the future in motivating – or de-motivating – the learner, we cannot effectively overhaul our schools, colleges or universities, no matter what innovation we introduce.

Current global issues, from climate change and peak oil to issues of human and environmental well-being, promise a future that will be very different from today and an uncomfortable and dangerous global transition ahead [16]. If educators do not help young people to feel empowered in relation to their future and future change then, it can be argued, they will have failed in their duty to the present generation of learners.

The papers

The papers in this issue are arranged into two areas: futures *in* education and futures *of* education. The first four papers offer case studies in which futures studies theories, concepts, and methods are introduced into educational settings in different ways. Both Bateman and Hicks explore futures education in schools, while Hutchinson and Herborn, and Nasruddin et al. offer case studies of futures in higher education. The remaining five papers (Gidley, Dahlin, Montuori, Hampson, Judge) move into more theoretical, visionary and speculative territory, exploring possible and preferred futures for education at all levels.

Bateman presents a micro study of what happens in school, in this case an Australian primary school, when teachers are encouraged to develop a futures perspective in their classroom practice. The author worked with a group of teachers over an extended period to ascertain both their own notions of futures and to broaden their understanding of futures education. This presented a significant challenge to the group who had to drastically reconceptualise their notion of futures and related classroom pedagogy. One goal was to produce appropriate classroom activities which they did, although accompanied by some doubt and concern. The children, however, responded with interest and enthusiasm to issues that directly affected their own lives. The paper illustrates both the difficulties which busy teachers labour under but also the excitement and creativity that futures education can unleash in the classroom.

Hutchinson and Herborn explore what happens when postgraduate students are encouraged to explore issues relating to environment, peace and futures through a guided urban walk in Sydney. In doing this the 'landscape' becomes open to different and wider interpretations of past, present and future. As an experiential learning activity the walk encourages reflection, discussion and debate on issues of peace and violence as witnessed and remembered through buildings, monuments and spaces in the city. In so doing it raises questions about alternative readings of past conflict relating to people and environment and, in so doing, makes alternative readings of future urban landscapes more possible and less open to foreclosure. The paper illustrates both the interrelationships between peace, environment and futures as well as the value of experiential interrogation of place.

Nasruddin, Bustami and Inayatullah analyse what happens when a university, in this case the Universiti Sains Malaysia (USM), takes to heart key insights and processes from futures studies in order to envision a range of alternative futures for higher education institutions. Staff at USM worked together to develop and explore five alternative scenarios, leading to identification of their own preferred vision for the future of the university. In their journey towards this future four stages of transformation were articulated: visioning, contesting, dynamic equilibrium and self-direction/externalisation. This dynamic action research provides an inspirational model for higher education in demonstrating how a university can engage in futures visioning and begin the consequent processes of institutional change.

Hicks explores what happened when UK futures educators argued for a futures dimension in the school curriculum by looking at both the forces that can support such an endeavour and the obstacles that may hinder it. Early initiatives in the futures field brought futures thinking to the attention of global educators who in the 80s emphasised the importance of studying global issues. The Global Futures Project in the 90s focused on research into young people's views of the future and the development of appropriate teaching materials for schools. Currently areas such as geography, global citizenship and education for sustainable development are most likely to engage in futures thinking. However, futures education in the UK is still at a pre-emergent stage, lacking the critical mass needed for wider engagement. In part this is due to the pervasive influence of neoliberal ideology on both society and education.

Gidley's paper takes a wide-angled theoretical view of the transformative potential of futures *of* education. She draws attention to the significance for education of new thinking patterns and ways of knowing that have been emerging over the last 100 years. She notes that throughout the 20th century, significant developments can be mapped within all the major

academic disciplines, and across them via inter-, multi-, and trans-disciplinary approaches. Gidley introduces three concepts – postformal reasoning integral theory and planetary consciousness – that could potentially transform the industrial model of education, entrenched since its inception 200 years ago. She also identifies three waves of evolutionary change in education over the last 100 years that could strengthen the development of evolutionary pedagogies for the 21st century.

Montuori argues that educational institutions across the globe are still mired in assumptions drawn from the machine/ industrial age, preparing students for reproduction and conformity rather than creativity. He proposes that creativity and imagination are keys to envisioning alternatives to the complex problems of post-industrial, even postnormal times. Montuori begins to articulate the philosophical foundations of an educational approach in which creativity is central to scholarship, where learners move from being consumers of information and knowledge as commodities, to being co-creators and participants in the postnormal dance of knowledge.

Hampson's paper focuses a critical lens on multiple ecological crises, including climate change. He notes that, in spite of the likelihood of a probable future which he calls "the long emergency," there is insufficient response to this in educational discourse. He advocates a deeply ecological education through identifying the significance of ecoliteracy as involving a critical contrast between two worldviews (modernism and a prospective ecological worldview). Hampson explores the possible futures of ecological thinking through a deep interpretation of ecology and related terms including ecosystem and eco-logics. He emphasises the complex integrative character of conceptual ecology, associating it with transdisciplinarity, integralism and critical realism under the overarching orientation of Boyer's scholarship of integration.

Dahlin's paper takes a long-range philosophical look into how human beings have conceptualised themselves throughout history, and what this means for education now and in the future. Using the Causal Layered Analysis (CLA) methodology developed by Inayatullah, he investigates what it means to be human through the deeper levels of worldviews and archetypes. Dahlin explores how ideas of human nature have metamorphosed from supranature (theological and mystical) via nature (philosophical and mechanical) to subnature (digital). He notes that the early 20th century psycho-utopian visions of a better society, based on the transformation of the human mind, have been replaced by digital utopias. Dahlin contrasts the transhumanist ideas of Ray Kurzweil with Rudolf Steiner's philosophical-spiritual understanding of human being and development, which underpins Steiner Waldorf education, presenting educators with an existential choice regarding the future of humanity.

Finally, Judge challenges us to think about the ways in which we construct and organise information and its intimate relationship with how we think and our capacity to enable higher orders of thinking, both individually and collectively. He traces a developmental trajectory for modes of presenting information, from simple bullet points, through nested menu items and discussion threads. Engaging the power of metaphoric language, he then explores what further structuring can be envisaged and how its many possible levels can be fruitfully distinguished to enable the emergence of more integrative and mature modes of discourse. Judge evokes such metaphors as weaving, the London underground map, and the Mobius strip to engage and stretch the imagination beyond the cognitively alienating conventional representation of system diagrams and concept maps. His overall argument is that more complex metaphors are needed to support higher orders of collective intelligence.

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