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11. Towards posthumanistic curricula in higher education

Taru Konst

Introduction

During the last few years, the European discussion on the development of higher education has mainly focused on lifelong learning and future competences required at work. This also concerns Finland, where change in work and its requirements from education are emphasized in educational discussion. Additionally, more attention is paid to economic questions and cuts in the financing of education, and less to the role of education as a provider of the wellbeing of people or socially and ecologically sustainable development. Themes such as climate change, equality or a sustainable future are usually ignored in the discussion of higher education (Tervasmäki & Tomperi 2018). However, higher education must be able to generate competences, which can solve challenges related to these issues. The world's leading panel of climate experts lately sounded the alarm that we are running out of time to get rising temperatures under control (IPCC 2018). Globalization continues and the challenges caused by it, such as climate change, are not to be solved by one actor, one state or one government. It requires extensive commitment to common goals, and multi-lateral co-operation and decision-making. Higher education has a significant role in ensuring knowledge and skills operate in this kind of environment.

The aim of this article is to discuss whether we should move from humanism in higher education (the traditional approach) to posthumanism, which better answers to the scientific view of reality in the 21st century, realizing that nature must be considered in all actions. The concept of posthumanism is here examined in the context of education, and the article justifies why the posthumanistic approach is necessary in education development. The empirical findings give examples of how we ignore posthumanism in curricula and in educational discussion in general. The outcome of this article is that we should initiate shared discussion on the values of higher education, take posthumanism into account in our values and in educational policy, and

renew curriculum planning so as to embed posthumanism there. Thus, we could get relevant new tools and concrete new ways of operating when providing higher education, which is able to build a more sustainable society and future for all species.

Posthumanism as a framework

Pedagogical discussion in European higher education has traditionally been based on humanism. However, science has taken huge steps forward, and it is worth considering whether the posthumanistic approach is more realistic and sustainable in relation to the current and future worlds, updating it to answer to the scientific view of reality in the 21st century. Posthumanism is based on humanism, but it differs from it by relegating humanity back to being one of the natural species, rejecting any claims based on anthropocentric dominance. According to posthumanism, humans have no right to destroy nature or set themselves above it in ethical considerations a priori. Human knowledge, earlier seen as the defining aspect of the world, is also reduced so that it has a less controlling position. Human rights exist on a spectrum with animal rights and posthuman rights. The limitations and fallibility of human intelligence are confessed, even though this does not imply abandoning the rational tradition of humanism. (Wolfe 2009; Evans 2015.)

Humanism affirms that human beings have the right and responsibility to give meaning and shape to their lives. According to humanism, a human being is self-imposed, determined and curious and has a strong potential for learning (Ruohotie 2002, 157). In addition, humanism is not theistic, and it does not accept supernatural views of reality (International Humanist and Ethical Union 1996). The development can be simplified and described as follows. According to Christianity, God is the most important, and because human beings are 'pictures of God', they are the second most important ones who can control the third most important one: nature. Humanism drops out gods and leaves human beings to control nature. Posthumanism sees human beings as a part of nature, and nature must be considered in all actions (Figure 1).

Posthumanism is a broad concept, and there are several different approaches to it and there have been several attempts to define it. Sometimes it is connected to transhumanism, achieved through the application of technology in order to expand human capabilities. In this article, we define *posthumanism* as follows: *posthumanism means seeing human beings as a part of nature and nature must be considered in all ac-*

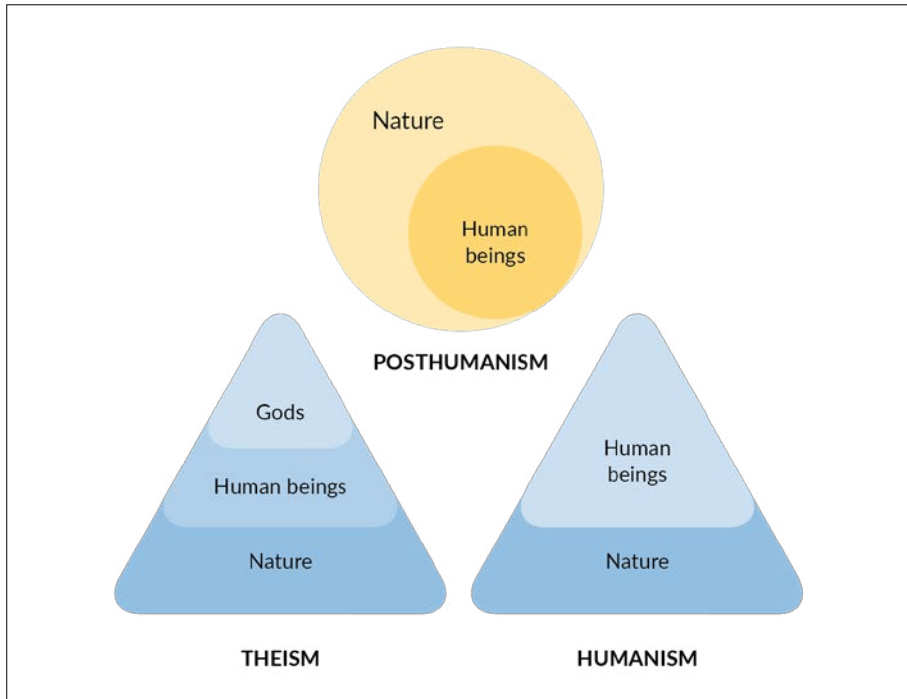


Figure 1. The core idea of posthumanism (Konst & Kairisto-Mertanen 2018, 27)

tions; human beings have no right to destroy nature or set themselves above it in ethical considerations. Thus, posthumanism is close to many Western, modern philosophies that recognize the holistic circle of life in which everything is related to every other thing. These are often also recognized in other cultural environments, for example, in the Buddhist tradition of the interconnectedness of all beings and its respectful relationship to nature. (Evans 2012.)

Posthumanism in the context of education

For the present, posthumanism has been quite invisible in education research and curriculum studies. However, there have been some attempts to bring posthumanism into educational discussion. For example, Snaza et al. (2014) state that posthumanism could transform educational thought, research and pedagogical practice and could do this in three ways: by forcing us to understand how resolutely human-

istic almost all educational research is, by allowing us to reframe education in order to focus on how we are always already related to animals, and by building on and incorporating these first two insights. (Snaza et al., 2014.)

How does posthumanism differ from humanism from the learning viewpoint? When humanism emphasizes the human social aspects, it does so in favour of non-human aspects. In other words, humans are considered active learners whereas non-humans are seen either as passive objects to be learnt about or as objects that facilitate learning. If we question the human centrism, we see learning where the learners are co-participants, entangled in the world they are learning from. Here learning is seen as a student's process wherein he or she learns through acting with the world she or he is part of and is co-creating. This approach emphasizes 'learning from the other', as a position that is not subject centred but other centred, and view on 'learning with', realizing that one is not the only one acting intentionally in the world. Instead, each subject needs to discover the human and nonhuman relations he or she is part of in our world. The widening of the understanding of each learner causes an unavoidable change process, wherein comparison to other learners is not important and constructing one's conception has a necessary and continuous impact on societal change. From an educational perspective, this means that all occurrences in learning situations are valuable because they generate various alternatives, especially compared to the current system, which is based on a permanent concept of knowledge, and searching for predefined answers. (Snaza et al. 2014; Ceder 2018.)

Thus, there is some research conducted on posthumanism from the learning viewpoint, but in the context of curriculum research, it has not been discussed much. However, curricula have a huge potential, both conceptually and politically, to forward values, attitudes and ways of thinking.

Today schools and universities are expected to respond to the social and economic needs of society: facilitating graduate employability, contributing to economic growth and development, assisting innovation, encouraging entrepreneurship etc. The curricula aim to generate competences in order to answer to these challenges. However, too often the curricula ignore or neglect the competences needed to solve the most wicked problem, climate change, and the issues closely connected to it, such as intensive livestock farming and animal rights. In other words, the values and ways of thinking behind curricula are not posthumanistic, although the sustainable future requires it.

Posthumanism can easily be justified from numerous viewpoints, such as ethical, environmental, economic, health and well-being, and equality viewpoints. Despite research results and alarming climate changes, our current lifestyle, based on the utilization of natural resources and animals, is still seen as acceptable. This practice, often called the *meat norm*, allows us to use animals as a means of production, food, entertainment and clothing. A society based on the meat norm is ethically and ecologically unsustainable, and thus meat consumption can no longer be considered citizens' private issue but can be considered a fact that threatens the continuity of life and the future of the whole planet. Avoiding meat and dairy products is the single biggest way to reduce one's environmental impact on the planet; without meat and dairy consumption, global farmland use could be reduced by more than 75% and still feed the world (Poore & Nemecek 2018). According to several research results, avoiding meat and dairy products (i.e. having a balanced vegan diet) is good for human health and prevents many diseases (e.g. heart disease and strokes), reduces the risk of diabetes and improves the symptoms of arthritis (see e.g. Craig 2009; Barnard et al. 2006; Campbell 2017; Clinton et al. 2015; Mishra et al. 2013). A plant-based diet is closely connected to climate change and to health issues; a global switch to diets that rely less on meat and more on fruit and vegetables could save up to eight million lives by 2050, reduce greenhouse gas emissions by two thirds and lead to healthcare-related savings. It could also avoid climate-related damages of US\$1.5 trillion (Springmann et al. 2016). However, the problems related to meat production and consumption can be reduced remarkably in the future if innovations such as artificial and/or cell cultured meat can be developed further.

In addition, exploiting animals is morally and ethically wrong because animals, as feeling creatures, have an absolute value that does not depend on humans or a monetary value imposed on them. The fact that humans are able utilize other individuals does not make the utilization justified. The freedom of an individual cannot hinder the freedom of other individuals, such as animals, which is why captivity and suffering surpass the limits of equitable individual freedom. Therefore, otherness does not justify unfair treatment because it is not logically sound to value differently the needs of humans and animals only because individual capacities are different. Even if different species have different typical qualities, all animals, just like humans, share basic common needs, of which avoiding pain and aiming at pleasure are essential. The fair treatment of animals is the minimum requirement for our own ethical and mental wellbeing. It is impossible to promote righteousness and nonviolence

between humans in a world where humans are allowed to treat other humans 'like animals'. Respecting animal justice is a natural continuum in the process of dismantling inequality from social structures. Equity in society means emphasizing the similar rights and equal value of different individuals, whether they are of a different sex, race, age, intelligence or species.

Altogether, animal issues are widely interconnected with other posthumanistic themes. They have a central position in such big challenges as environmental problems or injustice. Intensive livestock farming escalates climate change and is connected to social inequality and injustice. The justifications for posthumanism being as numerous as presented here, it is essential to also consider the posthumanistic approach in curriculum research and development. We need to include the viewpoints justifying posthumanism in the value basis of education, as well as in curricula contents. In Finland, curriculum reform should not be too challenging because universities and universities of applied sciences can decide both about curriculum content and methods to implement it. Especially in the universities of applied sciences, this autonomy has led to the development of so-called postmodern curricula, which integrate different subjects, are flexible and are based on working life's needs (Karjalainen 2007; Raivola et al. 2001). Here *postmodernity* is understood to focus on difference and diversity; recognize shifts in time, space and boundaries; and on openness to flexibility, creativity, agility and responsibility. According to MacDonald (2003), a postmodern curriculum may be viewed as moving towards an open system with constant flux and complex interactions; requiring interactive and holistic frameworks for learning, with students becoming knowledge producers rather than knowledge consumers; and as transformative rather than incremental with respect to change, such change requiring errors, chaos and uncertainty through the actions of the learners. In brief, postmodernity in the curricula of higher education allows us, if we want it, to reform and renew them to become posthumanistic curricula. In particular, the curriculum and its reform must be prevalent as a result of the awareness of the needs of society, the environment and nature and must take relevant action in accordance with those needs.

The absence of posthumanism in higher education: Empirical findings

On a practical level, it is easy to notice the absence of the posthumanistic approach in higher education. There is a lot of unawareness and ignorance of the topics related to posthumanism, and posthumanistic topics are not visible in curricula contents or

in the value basis of education. In the following we present some practical examples of the absence of posthumanism in higher education.

Several studies demonstrate unawareness, even among the highly educated adult population, about the living conditions of farmed animals, conflicts between their consciousness and treatment, or the impacts of animal-based food production on the environment or societal structures (e.g. European Commission 2005b; Jokinen et al. 2011; Kupsala et al. 2011, 2016; Foer 2009; Deemer et Lobao 2011). According to Eurobarometer, nine out of ten EU citizens think that the EU should do more to increase the awareness of animals and their treatment. In the EU countries, there is a growing concern about animal welfare, and the biggest changes have taken place in Finland, where 99 % think that farmed animals should be treated better. (European Commission 2005.) Despite of the general concern, the knowledge level of the everyday life of farmed animals is incomplete. For example, people are very often unaware what tie-stall cattle barns or farrowing crates mean in practice or what dairy production means for a dairy cow (the separation of calves from their mothers within the first 24 hours after birth, year after year, ending with the slaughter of the mother cow at a young age when the milk production lowers). These topics are not usually discussed at school at any level.

Curricula in higher education do not mention topics such as farmed animals and their living conditions, treatment or consciousness; animal rights; the impacts of animal-based food production etc. As an example, the curricula in all degree programmes at three universities of applied sciences in Finland were studied for the year 2018 and these topics were totally absent in all study fields (covering engineering, business and administration, health and wellbeing, and arts and culture). A more in-depth study was conducted for the year 2012, covering all degree programmes ($N = 101$) in the study field of social sciences, business and administration leading to a BBA (bachelor of business administration) degree. The primary objective of this research was to examine whether there were environmental issues in the curricula. The findings were that there are not any generic environmental issues or related labels that are usually covered in business studies at the Finnish universities of applied sciences. The most common context for environmental studies was in logistics / ethics / sustainable development / corporate social responsibility, which illustrates the embeddedness of environmental topics at the wider corporate level or social governance themes, or their mainstreaming in the context of other business studies. All in all, the research findings revealed the relatively weak position of environmental

issues in business education at the Finnish universities of applied sciences. This research material also indicated the total absence of animal questions in these curricula. The content and discourse analyses of the curricula studied not only the contents of courses and the study units offered but also the programme descriptions in order to examine the value basis behind these degree programmes. There were only two degree programmes out of 101 that mentioned that sustainable development and ethical issues were mainstreamed in the studies, and one degree programme especially emphasised ethical and responsibility perspectives in all their studies (Penttilä 2012). All in all, the humanistic approach is strong in curricula (the role of posthumanism being very weak), covering environmental issues to some extent but ignoring animal issues completely.

Higher education in Finland (i.e. universities and universities of applied sciences) enjoys extensive autonomy. Their operations are built on the freedom of education and research. They organize their own administration, decide on student admission and design the contents of degree programmes. The curricula in Finland are competence-based, and all degree programmes aim to provide their students with study field-specific competences and with the generic competences defined in the European Qualification Framework (EQF). The core of the EQF is formed of its eight reference levels, defined in terms of learning outcomes, in other words, in terms of knowledge, skills and attitudes expressing what individuals' know, understand and are able to do at the end of a learning process. Countries develop national qualifications frameworks (NQFs) to implement the EQF (European Commission 2005a). The reference levels concerning higher education do not mention competences, which could be interpreted as explicitly describing posthumanistic values.

Higher education institutions express the aims of their degrees in degree programme descriptions, usually in the context of the curricula. The description of a degree programme is a written document representing the purpose, objectives and core contents of a degree programme. These descriptions aim to give a realistic but also an appealing picture of the degree programme, because their purpose is to be informative, but they also form a part of programme marketing efforts. The texts usually focus on describing the main contents of the programme, the professional expertise that they provide, the educational and pedagogical solutions used, and the future positions of students graduating from the programme. These descriptions seldom mention posthumanistic values, such as a sustainable future, environmental protection, respect of life and all species etc. in any context.

In Finland, the absence of the posthumanistic approach is common on all educational levels. The curricula in upper secondary education offer some optional courses covering ‘posthumanistic topics’ such as environmental issues and animal protection, but in vocational education, these topics are only included occasionally at the initiatives of individual teachers and they are usually not covered at all. In primary education, topics such as environmental protection or sustainable development are included in the new curricula, but animal protection is only mentioned in the curriculum contents of the last course in biology, in the spring semester of the ninth class (OPS2016). Considering all this, the unawareness about animal questions described earlier is not surprising, even among the adult and/or highly educated population, in Finland. The invisibility of posthumanism seems to be a norm in the educational continuum. The situation does not look different outside Finland either. For example, research shows that a third of British children do not know where milk comes from and one in five believe milk comes straight from the fridge or supermarket (British Nutrition Foundation 2017). More than a third of British young adults (aged 16–23 yrs old) do not know bacon comes from pigs or butter from a dairy cow (Linking Environment and Farming 2012).

It is not only the curricula but also everyday practices in higher education institutions, which are very traditional and not considered from a posthumanistic viewpoint. Ways of thinking such as specism/speciesism (defining the value or rights of beings on the basis of the species one belongs to) or carnism (the culture-based classification of animals into edible and non-edible) are not discussed or questioned. For example, different diets are taken into account at university lunch restaurants, but the choices are accepted as individual decisions; institutional values do not guide the decision-making or question whether the choices have an impact on other living beings or on the environment.

Discussion

Why is posthumanism especially important in higher education? There is no longer time to rely on early childhood education and primary education developing our attitudes and ways of thinking, and ensuring that the future generations are more aware and responsible in their decision-making. The latest IPCC Report (2018) requires that we must act now to save the planet and slow down the climate change, and therefore young adults in higher education play a key role in our decision-making on how to make the required changes in our lifestyles. Considering the current

state of the world and all the justifications given earlier, we can state that we have to add posthumanistic values to the aims of higher education and ensure that all degrees given must be able to generate competences that show the way to a more sustainable and equitable future where all life is respected. Higher education can focus on these themes better if its values enable them and lead them in this direction. This also enables the development of higher education on an operational level according to the values.

Values do not mean empty words in curricula or extra costs in the implementation of education. They can generate new competitiveness and sustainable economic success for societies. Values turned into practices can mean, for example, new technical solutions constraining climate change, novel food innovations and their international development and export, sustainable and profitable food production, and innovations improving public health and decreasing health care costs.

The first practical steps focus on the change process of values and competences among university staff. The teaching staff needs to know facts about climate change and the ways to solve it, animal research results on animal consciousness and treatment etc. and therefore further training is useful, as is including these topics in teacher training. The Internet being the most popular information source for children and young people everywhere, is it important that teachers and education institutions of all levels are armed with the correct information and are able to help students to decipher between fact and fake information.

For the change to be real, the learners (i.e. the teaching staff here) must become motivated to unlearn something and replace it with new learning, and they will do so either by the mechanism of identifying with a new role model or by scanning the environment for the information most relevant to the problem. The actual change can then be thought of as a cognitive restructuring or redefinition of the problem that leads to new perceptions and judgements, and ultimately new behaviour (Schein 1987). In other words, the people must have the will to change their behaviour, it is not enough to just offer some new information. When there is the will and need to make change, the new information will also be adopted. Therefore, the values and competences of teaching staff cannot be changed with further training courses alone, but time and discussion on why the change is necessary are also needed. Embedding posthumanism in curricula – in its contents, methods and assessment – can then be the real and explicit outcome of this change.

Higher education aims to develop students' competences, generating opportunities for success in work and life, and these competences must be based on values. Moving towards posthumanism in values of higher education mean big challenges as Seshadri (2012) states, 'perhaps it is time we acknowledge that we cannot do anything at all about the appalling ways human beings treat other human beings or animals without rethinking and renewing our norms, presuppositions, platitudes, and morals with regard to life and what is living.' As animal researcher Elisa Aaltola writes, we need to ask ourselves: 'What are we doing to other species? Who are we as a species, and what sorts of values do we wish to follow?' (Aaltola 2018). Curriculum studies must return to the emphasis on new forms of being together without insisting on human exceptionalism. By doing so, curriculum studies could become the most politically and conceptually radical field of intellectual labour in the post-humanistic landscape. This sets many pressures on our traditional ways of thinking and needs new and radical repositioning of the teaching profession. 'It is said that it is education that can change the world, but we think it is people who first can and must change education' (Konst & Kairisto-Mertanen 2018, 6). The teachers, as well as the management and administrative level, in higher education institutions are in key roles in regard to how we will be able to move towards posthumanism in higher education. In brief, by paying attention to the posthumanism behind pedagogy and by renewing curriculum work and research, we could get new, relevant tools with which to build a more sustainable society and future for all species. The uncommon and invisible must be made common, transparent and explicitly expressed when developing higher education.

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