BOOK REVIEW

Law and Industry 4.0: Selected Perspectives on a New Scholarship of Teaching and Learning

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Law and Industry 4.0: Selected Perspectives on a New Scholarship of Teaching and Learning. Edited by Letlhokwa Mpedi and Mzukisi Njotini. LexisNexis (2020).

The articles in the book, *Law and Industry 4.0: Selected Perspective on a New Scholarship of Teaching and Learning* (edited book by Mzukisi Njotini and Letlhokwa Mpedi) address the disruption that is currently experienced in the education sphere, especially for legal students, educators, and practitioners, due to the proliferation of the technologies of the Fourth Industrial Revolution (4IR), such as robotics, artificial intelligence (AI), and information communication technologies (ICTs).

Several theorists have engaged with the positive and adverse effects of the technologies of the 4IR on society. On the one hand, theorists such as Klaus Schwab (2017) and Xu et al. (2018) contend that technologies of the 4IR can improve production in different nation-states, especially developing countries. In addition, Wim Naude (2019) and Ayentimi Tutu and John Burgess (2019) hold the view that the technologies of the 4IR can blur the inequality lines that exist in sub-Saharan Africa by creating jobs through the manufacturing and upskilling individuals to engage with this technological age. This is because the technologies of the 4IR are characterised by intensified technologies, such as AI, robots, and ICTs, which are important developmental bolsters.

On the contrary, some thinkers argue that there are some adverse effects of the 4IR technologies within the context of sub-Saharan Africa. Edmund Ugar (2022) points out that sub-Saharan Africans do not have the requisite resources and skills to engage with the technologies of this industrial era. The technologies of this epoch are disruptive due to their unpredictability. Consequently, these technologies have the potential to monopolise jobs, that is, ensuring that all jobs gravitate towards technologies and while jobs that are not technologically oriented become redundant (Ugar, 2022). However, while these arguments have been raised in the literature on the technologies and mindset of the 4IR, Mzukisi Njotini and Letlhokwa Mpedi (2020) and the contributors of this current reviewed book focus precisely on the effects of 4IR technologies in the academia and law firms.

The authors seek to investigate how to navigate through the effects of technologies within the legal sphere, especially in academia. Undoubtedly, with the ubiquity of technologies such as AI and ICTs, many jobs are being automated; what used to be the traditional way of

teaching is now slowly becoming obsolete. Currently, students can attend lectures remotely using technologies such as the internet and devices that make communication feasible. The emergence of COVID-19 upsurged the movement from traditional contact learning to mostly remote learning.

Contributing authors such as Daleen Millard and Riaan Loots (2020) point out that the use of technologies such as learning management systems (LMS) software attached to a technology like Blackboard, used for online learning at the University of Johannesburg (UJ), is of immense importance to teaching and learning. They argue that by using LMS, lecturers in the law department at UJ can now track students' progress and know struggling students who need academic, socio-economic, and psychological assistance using predictive analytics. Here, analytics means "the process of analysing data to uncover patterns using computer algorithms, programming and statistical modelling techniques to find valuable, timely correlations. This allows an institution to identify actionable insights which can drive decision-making" (Millard & Loots, 2020:7). Through learners' participation in the online space, using predictive analytics, educators can predict their performance and provide interventions where necessary. Blackboard Learn, used by the Faculty of Law at UJ, has been particularly useful in this regard. To get an accurate result from the abovementioned analytics, students' data, including their demographics, past education, and socio-economic conditions, are loaded into the system (Millard & Loots, 2020:9).

Furthermore, the book addresses the problem of disruption of the educational system from the perspective of robot-aided learning- a new learning method that is a step further from e-learning and uses robots to supplement teaching activities in schools (Njotini 2020:36). The book seeks to find out ways educators are adapting to this new trend and the skills they have acquired to enable a swift transition into the current modus operandi of educating students.

In addition, the book exposes the need for educators to leverage the benefits of technologies of the 4IR to accentuate teaching and learning, especially for law students. The book focuses on law students due to the automation of various legal apparatuses and ways in which legal authorities conduct their affairs. Currently, we now have sophisticated robots that are proliferating and acting as robot lawyers. For example, technologies such as Lisa and Billy, robot lawyers, are disrupting the traditional way of interpreting the law by automating legal services (Van Eck, 2020: 47). Given this disruption, there is a call for educators to diversify the skills of their law students in the age of advanced automated technologies. This is to ensure that universities remain afloat in producing law students. Nonetheless, this does not only apply to legal institutions and students. Technological disruption cuts across every facet of the education system. As a result, it has become evident that teaching and learning in our current social milieu categorised by technology can only be seamlessly feasible if educators can understand how technology works (Njotini, 2020:34).

Finally, the book also challenges educators within the law departments to ensure that they understand the disparity between different generations and their exposure to technologies when teaching. For example, the baby boomers generation, that is, those born after the Second World War; the X generation, children of the baby boomers; and the Y generation, those born in the 1980s, have different exposures to technologies (Louw 2020:64). Thus, law educators must learn how to use blended learning to accommodate these different generations of learners.

In as much as the book exposes the benefits of technology to the future of learning and teaching, the contributors also point out some of the adverse effects of the proliferation of

technology, especially predictive technologies. For instance, Millard and Loot (2020) contend that predictive technologies such as Blackboard Learn were not produced for the context of sub-Saharan Africa. As a result, these technologies do not consider the socio-economic conditions of this locale and their education grading method. For the authors, this posed some challenges to educators. I (Ugar 2022) have engaged elsewhere with the idea that technology should be regionally politicised to capture the conditions of various regions, a view that can be corroborated with the concerns of these authors. Here, I argued that technology is not value-neutral; it comes with its designers' values, norms, and politics embedded in them. This view is also shared by Winner Langdon (1989) and Don Ihde (1993).

In addition, the book also points out that predictive analytics may be biased. This is on the basis that because students come from certain demographics, plagued with certain socio-economic challenges, the technology then "assumes" that they may be facing academic challenges. However, it is not always the case that people from humble backgrounds experience academic challenges. Thus, a student's profile does not immediately tell if the student is having learning difficulties, as the predictive technologies will "assume."

Finally, the book is well written and organised. The book is written most simplistically and addresses a very important issue of our current social milieu: the rampant production of technologies and how these technologies affect the future of teaching and learning. In addition, even though the book is specifically written for the legal audience and educators, it applies to all education and work spheres. The book comes at a very important time in our history, the COVID-19 pandemic. It is an important time because of how the pandemic forced everyone to work, teach, and learn remotely while relying on technologies during the pandemic. The book challenges all educators to accept that technology is here to stay; it is all left for educators to upskill themselves to be relevant in this technological epoch.

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