


# Plagiarism and ghostwriting: The rise in academic misconduct

## AUTHORS:

Shawren Singh<sup>1</sup>   
Dan Remenyi<sup>1</sup>

## AFFILIATION:

<sup>1</sup>School of Computing, University of South Africa, Roodepoort, South Africa

## CORRESPONDENCE TO:

Shawren Singh

## EMAIL:

singhs@unisa.ac.za

## POSTAL ADDRESS:

School of Computing, University of South Africa, Cnr Christiaan de Wet Road and Pioneer Ave, Florida 1710, South Africa

## DATES:

**Received:** 12 Aug. 2015

**Revised:** 12 Oct. 2015

**Accepted:** 21 Dec. 2015

## KEYWORDS:

academic integrity;  
contract cheating; essay mills;  
university cheating

## HOW TO CITE:

Singh S, Remenyi D. Plagiarism and ghostwriting: The rise in academic misconduct. *S Afr J Sci.* 2016;112(5/6), Art. #2015-0300, 7 pages. <http://dx.doi.org/10.17159/sajs.2016/20150300>

The aim of this paper is to review the current situation regarding plagiarism and ghostwriting, and to stimulate debate about how universities should respond to the rise in these forms of academic misconduct. The apparent upsurge in academic misconduct means that universities today face one of the greatest challenges to academic integrity they have had to deal with ever since the university system came into existence some 800 years ago. Plagiarism and ghostwriting are undermining the integrity of university degrees to an extent not seen before. Academia and fraud are not strangers. Universities have a long history of cheating of one sort or another, often associated with examinations, but also with research. In the past this cheating involved activities such as smuggling notes (commonly called 'crib sheets') into examinations, and consulting them even under the watchful eyes of invigilators. It also involved students obtaining sight of an examination paper in advance. The fraudulent creation of research results has also been an issue. However, in the 21st century, the opportunities for cheating have exploded. This has resulted in universities becoming more concerned about ensuring the integrity of their examination processes and the degrees they award. Our paper focuses on cheating in the writing of dissertations or theses required at undergraduate or postgraduate level, with an emphasis on plagiarism and ghostwriting. We do not propose a simple solution to these problems, as preventing or stopping cheating is not just a matter of catching the wrongdoers. Cheating is endogenous to the current university education system, and needs to be addressed in terms of not only prevention and detection but also how people who are found to engage in such misconduct are treated. We suggest that creative ways of promoting learning would help to minimise cheating at universities. It is also important to ensure that the issue is discussed openly among students and faculty staff.

## Introduction

There have been some dramatic instances of academic fraud at universities.<sup>1-3</sup> Professors have been found to have no credible academic credentials, having either exaggerated or outright lied in their curriculum vitae.<sup>4-6</sup> Vice-chancellors have been accused of plagiarism<sup>7,8</sup> or been found to have plagiarised their theses.<sup>9</sup> Laboratory directors have been involved in the falsification of research findings.<sup>10-12</sup> However, such dramatic events, although interesting and often newsworthy, are fortunately quite rare. What is more concerning is the mundane matter of fraud or cheating at the routine examination level. The main form of cheating at university is inappropriate assistance in examinations, or in the preparation of written work submitted for evaluation.<sup>13</sup>

The extent of cheating at universities is hard to gauge.<sup>14-17</sup> This is largely because the most common reaction once cheating is exposed is that the institution becomes secretive. Over the years, students have been found consulting crib sheets or notes written on their skin, or hidden in pencil boxes or even sandwiches – to mention only a few hiding places. Students struggling to answer a question might also try to glance at the answer sheet of a fellow student.

Another form of cheating occurs when students have been informed about examination questions in advance. Perhaps more seriously, students have sometimes employed other people to actually sit their examinations. The most famous culprit of this offence was the late Senator Edward Kennedy, who paid a co-student and friend to sit a Spanish examination in his place. The university spotted the substitution and both students were expelled.<sup>18</sup>

However, despite the wide range of nefarious ways in which students have been known to cheat the system, academics often argue that traditionally there has been a low occurrence of this type of behaviour. An accurate estimate of the number of such incidents is almost impossible, as the only cases reported are those in which individuals are caught.

Cheating in examinations is difficult. It is hard to smuggle items into an examination hall and consult them unseen – despite the watchful eye of an invigilator. Nonetheless, some students try to do this. To counter the problem, at certain universities some subjects are examined in 'open book' exams, where the student may bring into the examination room any texts he or she might like to consult. This practice allows the student to refer to any material he or she wishes during the examination. In such exams, the application and interpretation of knowledge is tested, and for this reason open-book exams are often regarded as a superior form of test.

In many universities there has been a substantial increase in the use of term papers, assignments, and dissertations to evaluate the progress or knowledge development of students. Such documents are produced by the student outside of an examination environment. One reason for this system is the now widespread belief in the value of ongoing assessment instead of simply an end-of-term examination. However, when this type of written work is used for assessment, the system is especially vulnerable to cheating.<sup>19</sup> Because of this vulnerability, some older academics insist that formal examinations remain the only reliable method of student evaluation.

All forms of academic cheating are highly detrimental to any university. Academic cheating undermines the good name of the institution and calls into question the integrity of both the faculty and students. There is every reason for a university to take all forms of cheating seriously, and to eliminate it wherever possible.

This paper focuses on two specific types of academic misconduct, namely plagiarism and ghostwriting.

## Inappropriate assistance in preparing written work

There are several ways in which students can cheat in the preparation of written work. The two offences addressed in this paper are plagiarism and ghostwriting. Plagiarism has affected the academic community for centuries,<sup>20</sup> and allegations of plagiarism have been made against certain famous academics, including Galileo and Newton.<sup>21</sup> By contrast, ghostwriting in academia appears to be a relatively modern phenomenon, perhaps only a few hundred years old.

Stavisky<sup>22</sup> states that there has been a long tradition of plagiarism in American universities, fostered by fraternity groups and dating back to the 19th century. Fraternity files have been used to recycle written academic work. Stavisky also states that in the 1940s, advertisements appeared weekly in a prestigious New York newspaper, advertising ghostwriting services – which included producing dissertations, theses, and term papers. Stavisky goes on to describe how this practice proliferated in the 1960s and 1970s. With the arrival of the Internet, ghostwriting has become a global industry. The terms ‘paper mill’ and ‘essay mill’ are often used to describe this industry.

Plagiarism and ghostwriting, although different, have the same outcome: the student presents fraudulent academic work that is purportedly his or her own. In fact, it is the creation of another person or persons. The sections below discuss plagiarism and ghostwriting separately and in greater detail.

## Plagiarism

Plagiarism refers to the use of other people’s ideas and words without giving the original author appropriate acknowledgement.<sup>23,24</sup> If ideas are used in an essay or dissertation that have been found in the published work of another author, it is academic misconduct not to specifically acknowledge the original source. The acknowledgement must follow the rules of the referencing system employed in the work. Although the use of ideas without acknowledging them is an offence, it is even worse if the actual words of other authors are copied without acknowledgement. This principle sometimes leads to debate about how many words can be cited without incurring an accusation of plagiarism. Guidelines such as three, four, or five words are sometimes quoted. However, there is no simple answer to this question, and it is generally agreed that even a small number of words reproduced from another text need to be attributed.

There are several reasons why plagiarism is unacceptable in academic writing. The Penn State University website<sup>25</sup> lists a number of reasons, which include:

- Plagiarism committed intentionally is an act of deceit and may even constitute fraud.
- The plagiarist denies him or herself ‘the opportunity to learn and practice’ the skills of academic research.
- A plagiarist does not avail him or herself of the ‘opportunity to receive honest feedback’ on his or her academic skills.
- The plagiarist opens him or herself to future enquiry into his or her ‘integrity and performance in general’.

Clearly plagiarism is unacceptable. Universities generally state in their regulations that plagiarism is a disciplinary offence.<sup>26</sup> However, it is not always easy to ascertain what sort of penalty will be imposed on authors who are found to have plagiarised.

In recent decades, the Internet has become a common tool for academic research, and this has enabled plagiarism to flourish on a large scale.<sup>27-29</sup> It is impossible to estimate the exact extent of online plagiarism, but there are regular reports of students’ work being found to contain large passages copied from other people’s works by cut-and-paste methods, without any attribution. In 2015, Adams reported that in the United Kingdom, ‘in the past 4 years more than 58 000 undergraduates have been investigated by their universities for plagiarism’<sup>30</sup>. Some of these cases involve whole essays being copied and fraudulently presented under the name of the student being assessed.

Because of this situation, computer-based plagiarism detection methods and tools have become extremely popular with university faculty and administrative staff.<sup>31</sup> The market leader, Turnitin.com, claims to have 10 000 clients working in 135 countries, and this product alone is estimated as being used to check 40 million academic papers each year. Using anti-plagiarism software makes it relatively easy to detect and quantify how much plagiarism appears in a piece of academic work. However, this type of checking may be considered to be a ‘band aid’ or ‘sticky plaster’ placed on a wound when perhaps a more medical and surgical intervention is actually required.<sup>32</sup>

When plagiarism is suspected and this suspicion is supported by the software results, the issue arises of how to deal with the offence. University regulations specifically forbid plagiarism and may prescribe the need to refer such behaviour to a disciplinary procedure. However, such disciplinary action does not always happen.<sup>33</sup> Sometimes plagiarism is treated by giving the student a mark of zero for the work submitted. Sometimes the student is required to resubmit a new version of the work. In other words, formal disciplinary action is not automatically invoked.<sup>34</sup> The process of university disciplinary action can be a long and costly procedure, and universities are often reluctant to follow this course on the grounds of the resources a formal plagiarism enquiry would require. Mathews<sup>35</sup> quotes an academic, who wished to remain anonymous, as saying, ‘I’m ashamed to admit it but you simply don’t have the time to launch a plagiarism case.’

If this is indeed the case, is the university not implicitly condoning plagiarism? In any event, plagiarism is frequently regarded more as a misdemeanour than a felony. Nonetheless, the practice of plagiarism undermines the integrity of the academic process, and calls into question the quality of education that is said to be evident in the holding of a degree.

It has been suggested that plagiarism is rife in certain cultures, and in developing countries in particular.<sup>36</sup> This may be true, but the challenge is certainly not absent from western culture or universities.

## Ghostwriting

Ghostwriting is the practice of hiring a writer (or writers) to produce a piece of work that follows a predefined style, and none of the original writing credit is attributed to the ghostwriter. The practice of ghostwriting has long existed in the field of literature. Related practices occur in other forms of the arts, including music composition, singing, and the visual arts. In the university context, all subjects are to some extent vulnerable to plagiarism. But with regard to ghostwriting, computational sciences are particularly vulnerable. Specialist websites can produce programming code for computer science students.<sup>37</sup> Undergraduates have been known to pass on, or indeed sell, their laboratory journals to other students – which in some cases have been copied verbatim the following year.

Ghostwriting has traditionally been associated with famous individuals who have contracted someone else to produce a work in the field of literature, perhaps an autobiography, because they do not have the time or skills to complete the task themselves.<sup>38</sup> The ghostwriter produces the work for an agreed fee. This is a legal and sustainable business, and many ghostwriting agencies have a substantial history of success.<sup>39</sup>

In pre-Internet days, a student struggling to complete an essay or assignment might have asked a friend or family member (or another individual) to help write a piece of the work. Sometimes money changed hands, but not always. It would generally have been difficult to find someone to do this type of work and the incidence of such collusion would have been low. The Internet has changed things, and a large number of essay-writing services are now offered on the web.<sup>40</sup>

Some providers offer a full range of services, from writing a simple essay to producing a doctoral thesis. Furthermore, the purchaser is able to specify if he or she wants an essay to be written to a particular standard of excellence, such as being good enough to obtain a first class or a second class grade. Some of these services respond quickly, offering a 24-hour turnaround time for an essay. Of course, the fee asked for the

production of one of these essays depends on the standard required and the time-frames for delivery.<sup>27</sup> The academic networks these organisations purport to have established suggest that a large number of competent academics are willing to earn money from the process of defrauding, or at least undermining, the examination process.

When ghostwriting services first appeared on the Internet, they were relatively unsophisticated and a number of ghostwritten essays were caught by anti-plagiarism software. However, today the suppliers of these essays claim they can produce work that will not be detected by such software. Although there are programs that claim to be able to identify authors by their style using the principles of stylometry, a competently-produced piece of work by a ghostwriter would be original and thus would not be detected by software alone.

The range of organisations offering ghostwriting services is impressive. A recent Google search produced over 4.6 million references to these services in less than half a second. A number of these organisations claim that they employ graduates and faculty members from the best universities. It has been estimated that in the United Kingdom alone, more than GBP200 million is spent annually on these services.<sup>41</sup>

The classification of this type of academic misconduct is not always easy to define. Ghostwriting differs from plagiarism, although this point is not universally agreed on. For example, University College London (UCL) states that plagiarism includes 'turning in someone else's work as your own'.<sup>42</sup> Plagiarism is sometimes defined as theft, and the word 'plagiarism' comes from the Latin word for kidnapping. But ghostwriting is different; there is no direct theft involved. It is rather a question of misrepresentation or lying about the authorship of the work. However, this type of offence could be considered an extreme form of plagiarism at least. Some academics feel that ghostwriting is considerably more serious than plagiarism with regard to the degree of violation of academic trust.

Tomard<sup>39</sup> suggests that there are three distinct categories of students who employ ghostwriters. The first are students whose command of the English language is not sufficient to be able to write a competent research report. The second group includes students who have not been able to grasp the detail of the processes involved in academic research methodology, and therefore need an expert in the field of study to write up the research. The third group consists of students who are both uninterested in their studies and sufficiently well-funded to be able to afford the high fees asked by ghostwriting agencies. Being able to identify these groups should facilitate the university in creating policies to counter this type of academic misconduct.

When a dissertation is presented to a university, traditionally it has to be accompanied by a Certificate of Own Work.<sup>43</sup> This certificate is sometimes a simple one-sentence statement, signed by the student. If it transpires that the statement was false, that renders the work null and void and a degree would not be awarded. If a degree has already been awarded and it is subsequently found out that the student did not perform the work, the degree may be withdrawn. However, certification of authenticity has generally not been required for other work submitted, such as essays or term papers. Perhaps such certification should now become a routine requirement.

If a piece of academic work has been ghostwritten, this can generally be detected only if the evaluator is personally acquainted with the student's level of subject knowledge and his or her natural writing style.

## Extent of cheating

As noted earlier, it is difficult to give an estimation of the extent to which cheating occurs. However, it is clear that the ghostwriting industry is highly active and appears to be expanding. This trend is certainly cause for concern.

Universities are often quite secretive about issues concerning discipline, or in fact any legal action in which they are involved. Documentary filmmakers have suggested that there are a growing number of students taking action against universities on a wide range of issues. Most of these cases have to do with universities not living up to promises they made to students before the students registered. However, in at least one case on record, a student

sued a university after he was accused of plagiarism.<sup>44</sup> He argued that the university had not appropriately informed him that plagiarism would be regarded as academic misconduct, and therefore he could not be held responsible for an activity he did not realise was regarded as misconduct. It is hard to imagine how anyone could have come through schooling in the western world, including the early years of university, without having the issue of plagiarism fully explained to them.

## The special case of dissertations

Formerly, dissertations and theses were an academic activity that was required only at the level of masters and doctoral degrees. However, this has changed, and dissertations are now often required at undergraduate level.<sup>45,46</sup> As a material piece of work that is researched and written almost wholly by the student, sometimes without much direct assistance by academic staff, the dissertation has become an important part of many degrees.

Students often struggle with their dissertations, which can be a significant challenge. Ranging in length from perhaps as few as 5000 words at undergraduate level to as many as 50 000 words at masters level and 80 000 words at doctorate level, the dissertation requires a material amount of focused work over an extended period of time.

Sometimes at master's level, and even more so at doctoral level, many universities experience a high rate of non-completion of this type of work.<sup>47-49</sup> For a number of reasons, students are not able to complete all the work required for a dissertation. This happens more frequently among part-time students, especially at doctoral level. For this reason it has been suggested by some academics that a doctoral degree candidate could outsource some of the work required. However, this leads to some challenging questions and issues.

Attitudes towards outsourcing differ considerably from university to university. Some universities take the stance that virtually nothing should be outsourced, whereas others are far more relaxed. The reality is that students have long outsourced certain aspects of their dissertations. For many decades and probably for most of the 20th century, students have had their dissertations typed by others, normally professional typists. When word processors became commonplace and desktop typesetting became available, students had their work professionally produced without any questions being raised.

However, there are a number of other aspects of the research work that outsiders now offer to undertake for students, and which are not as acceptable as typing and typesetting. For example, it has been proposed that compiling the literature review, collecting the data, and analysing the results are all activities that could be outsourced. These are important doctoral-level activities, and as such are central to the intellectual development of the student. Having these tasks performed by anyone other than the student (i.e. the degree candidate) undermines the objective of acquiring the degree. It is difficult to see how this level of outsourcing could be acceptable to the academic world.

Another aspect of dissertations also presents a major problem, although it might not be regarded as so obviously problematic as the issues described above. That is the actual writing of the dissertation. Frequently students are not accomplished academic writers, and the way they attempt to present the arguments behind their research can be difficult to understand. Traditionally a supervisor would give the student guidance with regard to academic writing style, and in some cases supervisors would actually edit the text of the dissertation. However, some universities explicitly forbid supervisors to do this, and the result has been that students now tend to hire freelance editors. In some cases, the amount of work undertaken by these editors has amounted to having the dissertation ghostwritten.

At the same time, as mentioned earlier, the ghostwriting industry now offers the writing of an entire dissertation as part of its product range. Some of the claims are startling, as they suggest an entire dissertation can be produced within a matter of weeks – if not days. It is hard to imagine what calibre of university would accept a student who presents a dissertation, even at undergraduate level, without having had a number

of consultations with his or her supervisor. In the case of masters or doctoral degrees, universities require a number of years of supervised research before a final dissertation can be submitted or considered. Nonetheless, the fact that dissertations are being offered for sale by ghostwriting enterprises strongly suggests that there are indeed universities that accept this type of written work and award degrees on the basis of ghostwritten dissertations.

### The ethics of the ghostwriter

It does not appear that ghostwriters have much, if any, ethical concern about the work they do. Ghostwriting agencies boast that they hire only writers with the highest qualifications from the best universities, and judging from the apparent satisfaction of their clients this does seem to be the case. One ghostwriter who decided to write anonymously for *The Times Higher Education*<sup>50</sup> stated:

*I don't justify the work I'm doing on ethical grounds. While what I do is not illegal, it does enable others to break rules and suffer the consequences if they are caught. The agencies maintain the image of legitimate businesses: many do not even refer to 'cheating'. You are simply 'helping' with an assignment (making up, as one agency argues, for the university's failure to provide adequate tuition). While I'm happy to acknowledge that I am dependent on clients' continued cheating, this doesn't mean I am not conscious that my job is a symptom of an illness, a fracture, in our universities.*

It is challenging not to sympathise with the argument that the university system is 'fractured'. However, the argument used by many essay mills – that they are only 'helping' students – is at best disingenuous.<sup>36</sup> This is a for-profit industry that operates within the law but exhibits little concern about the morality of its activity.<sup>51</sup>

Interestingly, the same ghostwriter quoted above<sup>50</sup> also commented that:

*I stay away from applied fields – it is my only ethical standard as a ghost writer. I will not help a nurse to qualify on false pretences: who knows, it might be my parents who find themselves in their care.*

This is an interesting admission of the impropriety involved in the act of ghostwriting.

### The reaction of the universities

The issue of plagiarism and ghostwriting is of critical importance to universities for at least two reasons. The first is that these types of misconduct discredit the degrees that are awarded. If plagiarism and ghostwriting are perceived as being rife at a particular university, this is a disincentive to anyone who desires a robust qualification to attend that institution. The second reason is that it is unfair for a student to obtain credit for work he or she did not actually do. Having the money to buy completed academic work does not enhance the intellectual capability of the student – as the holding of a degree is supposed to indicate. Furthermore, the consequence of such misconduct is that honest students are placed at a disadvantage.

With regard to plagiarism, in general universities have reacted rather slowly and with some trepidation. A few years ago, when plagiarism was suspected in a master's degree dissertation by an examiner and the use of anti-plagiarism software was suggested, the student's supervisor might have exclaimed, 'Are you impugning the integrity of my student?' Fortunately, those days are past and most universities now require dissertations to be submitted both electronically and in hard copy (i.e. on paper). Nonetheless, the question of what action to take against people who are found to be plagiarists has not been answered.

Ghostwriting is, in a sense, a more difficult issue than plagiarism. The outright purchasing of essays, term papers, and dissertations is clearly an act of fraud. It would be unwise for a university to do anything less than take the most severe disciplinary action. But in some cases, obtaining

help from an informal mentor could come quite close to ghostwriting, and penalising this activity could present difficulties. Perhaps the real issue is that universities have been, and still are, focused on catching misconduct after it has occurred instead of preventing it. Is there really any way of preventing these types of cheating? The answer is an unreserved 'yes'. How this can be done is addressed below, under the subheading 'Prevention and detection'.

### The university as a fractured institution

In discussing how universities have become fractured, it is necessary to bear in mind the exceptional pressures these institutions have had to face in recent years. Since the mid-1990s many universities have been expected to deliver what is sometimes referred to as 'mass education'.<sup>52,53</sup> This term is not well defined but its general meaning is clear: education has to be made available to large numbers of students.

At the same time, the resources made available to universities have not correspondingly increased. Class sizes have increased, with a concomitant unfavourable shift in the ratio of students to lecturers. In some cases, lecturers no longer grade the work of their students and this task is sub-contracted to either teaching assistants or even to outside contractors. In addition, a greater number of students from other countries, who may have inadequate command of English, are being admitted to degree courses at English-medium universities. These factors have made the relationship between faculty and students more challenging, as illustrated by the following remarkable statement made by the anonymous ghostwriter<sup>50</sup>:

*I operate on the assumption that the student I'm working for will have little or no personal interaction with academic staff. This means there is only a small likelihood that the lecturer who sets and marks the questions will be familiar with the student's style of writing.*

If this is a correct assessment of the situation, and there is *prima facie* evidence to suggest that it is, then the universities for which this is true are not performing their expected function.

The American publication *The Chronicle of Higher Education* interviewed a ghostwriter who remarked as follows<sup>54</sup>:

*You've never heard of me, but there's a good chance that you've read some of my work. I'm a hired gun, a doctor of everything, an academic mercenary. My customers are your students. I promise you that. Somebody in your classroom uses a service that you can't detect, that you can't defend against, that you may not even know exists.*

Matthews similarly reflected on ghostwriters' services as follows<sup>55</sup>:

*There are also concerns that in an age of mass higher education and high student-to-staff ratios, lecturers are less able to get to know their students' work, making this form of cheating more difficult to detect. And there are fears that the pressures of the job might encourage some academics to turn a blind eye to the practice. But perhaps the most important question is whether it is possible to prevent this form of cheating in the first place.*

It is clear that universities are not addressing this subject with the energy or commitment one might expect when such important issues are at stake.

### The function of universities

The purpose of a university is not only to communicate and test students' knowledge but also to inspire them to become lifelong learners.<sup>55,56</sup> This means there should be an onus on the university to help students realise that engaging with the subject matter is interesting, enjoyable and rewarding. If these positive experiences are achieved, learning should occur naturally and students should become well-informed in their fields of study. If this were the case, there would be little (or less) motivation for anyone to cheat.

Although some academics would argue that they already take this approach to teaching, in reality most lecturers present fairly routine material, and students are expected to learn and to reproduce it in rather unimaginative ways – either during examinations or in essays, term papers, and even dissertations. This means the evaluation processes in universities are often a test of one's memory of material that has been offered for the purposes of learning in a relatively structured fashion. When this approach is combined with large numbers of students, the temptation to engage in plagiarism or use ghostwriters appears to offer a solution to some students.

## **Prevention and detection**

Some universities have taken the view that plagiarism and ghostwriting can be prevented by adequate detection methods and the imposition of appropriate penalties. For this reason, anti-plagiarism software has become a large business sector. The penalties imposed by universities range from requiring the student to resubmit the piece of work to suspending or even expelling him or her from the university. However, universities do not easily impose suspensions and expulsions. Students sometimes face only a rebuke and have to resubmit their work. Countering plagiarism in this half-hearted manner may, however, produce an 'arms-race' mentality, so that those who facilitate students' cheating will try to create increasingly clever ways of avoiding anti-plagiarism software. A better approach is to reassess the university's attitude to teaching and learning.

The New Zealand Government has produced an interesting set of guidelines for the effective prevention and detection of academic fraud.<sup>57</sup> The approach is intended to create awareness of the potential problems of academic fraud, and to continually remind students about how unacceptable the practice is. It is then necessary for staff to engage continually with their students and to be on the lookout for any surprising changes in their performance. This means getting to know the students well. All of these suggestions are welcome, but they are time-consuming to put into practice. In general, academics regard themselves as having a full workload without taking on any extra engagements or responsibilities.

Implementing the types of policies suggested in the New Zealand guidelines represents a significant move away from present general practice. The cost of such a transformation would be regarded by many to be a heavy burden on the financial resources of educational institutions. In addition, not all academics would necessarily welcome such a change. There is little doubt that many academics are largely comfortable with the present system.

With regard to ensuring the integrity of a dissertation, the issue is one of adequate supervision. If a programme of careful supervision is in place, there should be relatively little opportunity for plagiarism to escape unnoticed in the writing of a dissertation. To a large extent, a dissertation should be almost co-created by a student and his or her supervisor, with the student doing the work and the supervisor keeping a close eye on what is happening step-by-step.

With regard to ghostwriting, there should be almost no opportunity for a student to pass off a piece of work produced in this way. If the supervisor does not know the student well enough to be able to immediately detect that a written submission is inauthentic, the supervisor is not actually doing the job adequately. Unfortunately, some universities do not allocate sufficient time to supervisors for them to be able to get to know their students well enough; consequently, they may indeed be unable to detect if the work submitted has been written by someone else.

## **Summary and conclusion**

This paper has reviewed the current situation with regard to plagiarism and ghostwriting at university level. The objective of the discussion was to stimulate debate as to how universities should react to these types of academic misconduct. (The paper has deliberately avoided addressing how these problems may be exaggerated in distance learning or e-Learning university programmes.)

The number of students who plagiarise or use ghostwriters appears to be on the increase. Although as a percentage of the entire student population, the number of those who engage in academic misconduct is believed to be small, even that small percentage represents a large number of students in absolute terms. This is cause for concern. If cheaters manage to 'beat the system' and obtain a degree they have not earned through their own academic performance, these fraudsters would represent a significant threat to the integrity of the relevant department, faculty, and university – indeed, to the whole notion of higher education.

Plagiarism and ghostwriting must be eliminated to the fullest extent possible, because these practices are fundamentally unfair to honest students who rely on their own intellectual abilities to create the academic work required of them.

In general, plagiarism is a substantial and unwelcome misconduct, but it tends to be relatively easily identifiable. However, as it is regarded a form of academic fraud, there should be a material penalty paid by those who are found to engage in this behaviour. Although universities are in a position to impose such penalties, they do not appear to do so adequately and effectively, or often enough.

The use of a ghostwriter is an offence for which a greater penalty should be paid. Although ghostwriting is not illegal, lying about the authorship of a piece of work is potentially fraudulent. Ghostwriting cannot be easily detected by software in the same way as plagiarism can. There are some products that employ stylometry, and these may be of help and could be utilised by universities. However, ghostwriting is best detected by lecturers having personal knowledge of the capabilities of their students. Introducing a greater number of oral examinations could quickly and easily eliminate the entire issue of ghostwriting. Unfortunately, it would also create a substantial workload, which the current university examination system is ill-equipped to deal with.

Nonetheless, the overall approach of identifying academic misconduct and imposing penalties is unlikely in itself to solve the problem. What is really required is a new attitude to prevention. This would involve creating learning environments in universities that would invite students to become highly engaged with their subject material, and to express their creativity in such a way that it would be apparent who has succeeded in the learning process and who has not. Students who have succeeded should be valued and rewarded with an appropriate degree, whereas those who do not master the process will be deemed to have failed.

With regard to misconduct at the dissertation level, it should not be a major problem for supervisors who are sufficiently engaged with their students to be able to detect misconduct. Most supervisors have access to anti-plagiarism software, and it is a simple matter to pass submitted work through such an analysis. On the question of ghostwriting, although a supervisor should expect the writing style of a student to improve significantly during the course of producing a dissertation, an extraordinary level of improvement should become the subject of an enquiry and maybe even an investigation. There needs to be a severe penalty for those who engage in this type of misconduct; the treatment of serious academic misconduct must be sufficiently firm to tackle the problem effectively.

Finally, it is also important for the issue of plagiarism and ghostwriting to be discussed more openly and regularly within universities. There might even be certain proven or known incidents where the transgressors should be named and shamed.

## **Authors' contributions**

Both authors contributed equally to the manuscript.

## **Acknowledgement**

The authors would like to acknowledge the assistance of Dr Filistea Naude from the Unisa Science Campus Library.

## **References**

1. Retraction Watch [homepage on the Internet]. No date [cited 2015 Jul 28]. Available from: <http://retractionwatch.com/>

2. Bhattacharjee Y. The mind of a con man. *New York Times*. 2013 April 26 [cited 2015 July 28]. Available from: [http://www.nytimes.com/2013/04/28/magazine/diederik-stapels-audacious-academic-fraud.html?pagewanted=all&\\_r=1](http://www.nytimes.com/2013/04/28/magazine/diederik-stapels-audacious-academic-fraud.html?pagewanted=all&_r=1)
3. Honig B, Bedi A. The fox in the hen house: A critical examination of plagiarism among members of the academy of management. *Acad Manag Learn Edu*. 2012;11(1):101–123. <http://dx.doi.org/10.5465/amle.2010.0084>
4. Lewin T. Dean at M.I.T. resigns, ending a 28-year lie. *New York Times*. 2007 April 27 [cited 2015 July 28]. Available from: <http://www.nytimes.com/2007/04/27/us/27mit.html>
5. Farrell EF. California poet laureate admits to lie on résumé. *Chronicle of Higher Education*. 2002;49(12).
6. Flynn NS. UCD inquiry to study vetting practices. *The Irish Times*. 2001 November 13 [cited 2015 Aug 04]. Available from: <http://www.irishtimes.com/news/ucd-inquiry-to-study-vetting-practices-1.336913>
7. Guha A. Vice-Chancellors are not angels. *Frontier*. 2011;43(45); May 22–28 [cited 2016 May 17]. Available from: <http://frontierweekly.com/archive/vol-number/vol/vol-43-2010-11/vol-43-45/vicechancellors-43-45.pdf>
8. Monash head leaves over plagiarism charge. *The Guardian*. 2002 July 18 [cited 2015 Jul 28]. Available from: <http://www.theguardian.com/education/2002/jul/18/highereducation.uk>
9. Rodan P. A modest victory for academic values: The demise of David Robinson. *Australian Universities' Review*. 2004;46(2):16–22.
10. Columbia University. The cloning scandal of Hwang Woo-Suk [article on the Internet]. c2015 [cited 2015 Jul 28]. Available from: <http://stemcellbioethics.wikischolars.columbia.edu/The+Cloning+Scandal+of+Hwang+Woo-Suk>
11. McNeill D. In Japan, research scandal prompts questions. *The Chronicle of Higher Education*. 2014 June 30 [cited 2015 Jul 28]. Available from: [http://chronicle.com/article/In-Japan-Research-Scandal/147417/?cid=at&utm\\_source=at&utm\\_medium=en](http://chronicle.com/article/In-Japan-Research-Scandal/147417/?cid=at&utm_source=at&utm_medium=en)
12. Office of Research Integrity. Case summaries [article on the Internet]. c2015 [cited 2015 Jul 28]. Available from: [https://ori.hhs.gov/case\\_summary](https://ori.hhs.gov/case_summary)
13. Papp R, Wertz MH. Academic integrity violations: Isolated problems or epidemic? In: SAIS 2005 Proceedings; 2005 February 25–26; Savannah, GA, USA. Available from: [http://aisel.aisnet.org/sais2005/30/?utm\\_source=aisel.aisnet.org%2Fsais2005%2F30&utm\\_medium=PDF&utm\\_campaign=PDFCoverPages](http://aisel.aisnet.org/sais2005/30/?utm_source=aisel.aisnet.org%2Fsais2005%2F30&utm_medium=PDF&utm_campaign=PDFCoverPages)
14. Sheard J, Dick M, Markham S, Macdonald I, Walsh M. Cheating and plagiarism: Perceptions and practices of first year IT students. *ACM SIGCSE Bulletin*. 2002;34(3):183–187. <http://dx.doi.org/10.1145/637610.544468>
15. Thomas A, De Bruin GP. Plagiarism in South African management journals. *S Afr J Sci*. 2015;111(1/2), Art. #2014-0017, 3 pages. <http://dx.doi.org/10.17159/sajs.2015/20140017>
16. Goveneder P. Universities battle a rising tide of cheating. *Time Live*. 2014 August 17. Available from: <http://www.timeslive.co.za/local/2014/08/17/universities-battle-a-rising-tide-of-cheating1>
17. The good, the bad, and the ugly. *S Afr J Sci*. 2003;99(9/10):402–403.
18. LeBlanc S. Harvard to honor Ted Kennedy, once expelled for cheating. *CNSNews.com*. 2008 December 01. Available from: <http://cnsnews.com/news/article/harvard-honor-ted-kennedy-once-expelled-cheating>
19. Wallace MJ, Newton PM. Turnaround time and market capacity in contract cheating. *Educ Stud*. 2014;40(2):233–236. <http://dx.doi.org/10.1080/03055698.2014.889597>
20. George JF, Davison RM, Heales J, Munro M. Report of the ad hoc committee on member misconduct to the AIS Council. *Communications of the Association for Information Systems*. 2003;11(1):2.
21. Reston J. *Galileo: A life*. Washington: Beard Books; 2000.
22. Stavisky LP. Term paper 'mills', academic plagiarism, and state regulation. *Pol Sci Quart*. 1973:445–461. <http://dx.doi.org/10.2307/2148993>
23. Clarke R. Plagiarism by academics: More complex than it seems. *J Assoc Inf Systems*. 2006;7(2):5.
24. Randall M. *Pragmatic plagiarism: Authorship, profit, and power*. Toronto: University of Toronto Press; 2001.
25. PennState. Why plagiarism is wrong [article on the Internet]. c2015 [cited 2015 Sep 22]. Available from: <http://tit.psu.edu/plagiarism/student-tutorial/why-plagiarism-is-wrong/>
26. University of Oxford. Plagiarism [homepage on the Internet]. No date [cited 2015 Sep 22]. Available from: <http://www.ox.ac.uk/students/academic/guidance/skills/plagiarism>
27. Singh S. The zombie doctorate. In: *Proceedings of the 14th European Conference on Research Methodology for Business and Management Studies*; 2015 June 11–12; Valletta, Malta. Reading, UK: Academic Conferences and Publishing International Ltd; 2015.
28. Hallak J, Poisson M. *Corrupt schools, corrupt universities: What can be done?* Paris: UNESCO International Institute for Education Planning; 2007.
29. Richards D, Busch P, Germanou D, editors. *Elearning promoting plagiarism or honesty?* In: PACIS 2011 Proceedings; 2011 July 7–11; Brisbane, Australia. Available from: <http://aisel.aisnet.org/pacis2011/>
30. Adams R. Cheating found to be rife in British schools and universities. *The Guardian*. 2015 June 15. Available from: <http://www.theguardian.com/education/2015/jun/15/cheating-rife-in-uk-education-system-dispatches-investigation-shows>
31. Roberts J, Wasieleski D. The contemporary plagiarist: The roles of technology and moral development. In: *ICIS 2011 Proceedings*; 2011 Dec 4–7; Shanghai, China. Available from: <http://aisel.aisnet.org/icis2011/proceedings/IScurriculum/9>
32. Warn J. Plagiarism software: No magic bullet! *High Educ Res Dev*. 2006;25(02):195–208. <http://dx.doi.org/10.1080/07294360600610438>
33. Thomas A, De Bruin GP. Student academic dishonesty: What do academics think and do, and what are the barriers to action? *Afr J Bus Ethics*. 2012;6(1):13–24. <http://dx.doi.org/10.4103/1817-7417.104698>
34. Fuzile B. Plagiarism cases rock Fort Hare. *Times Live*. 2013 April 09. Available from: <http://www.timeslive.co.za/thetimes/2013/04/09/plagiarism-cases-rock-fort-hare>
35. Matthews D. Essay mills: University course work to order. *Times Higher Education*. 2013 October 10. Available from: <https://www.timeshighereducation.co.uk/features/essay-mills-university-course-work-to-order/2007934.article?page=0%2C1>
36. Matthews D. East Asia has 'toxic academic culture'. *Times Higher Education*. 2015 September 07. Available from: <https://www.timeshighereducation.com/news/east-asia-has-%E2%80%98toxic-academic-culture%E2%80%99>
37. BESTGhostWriters. Programming ghostwriter [homepage on the Internet]. No date [cited 2015 Sep 22]. Available from: <http://www.bestghostwriters.net/programming-ghostwriter/>
38. PLoS. Ghostwriting collection [homepage on the Internet]. No date [cited 2015 Jul 28]. Available from: <http://collections.plos.org/ghostwriting>
39. Tomar DA. Detecting and deterring ghostwritten papers: A guide to best practices [article on the Internet]. c2015 [cited 2015 Aug 04]. Available from: <http://www.thebestschools.org/resources/detecting-deterring-ghostwritten-papers-best-practices/>
40. Auger GA. Missing citations, bulking biographies, and unethical collaboration: Types of cheating among public relations majors. *Journal Mass Comm Educat*. 2013;68(2):150–165. <http://dx.doi.org/10.1177/1077695813476953>
41. Taylor M, Butt R. How do you make £1.6m a year and drive a Ferrari A: Sell essays for £400. *The Guardian*. 2006 July 29. Available from: <http://www.theguardian.com/uk/2006/jul/29/highereducation.education>
42. University College London. Plagiarism [homepage on the Internet]. No date [updated 2013 Sep 13; cited 2016 May 8]. Available from: <http://www.ucl.ac.uk/current-students/guidelines/plagiarism>
43. Remenyi D. *Writing up your research*. 2nd ed. Reading, UK: Academic Conferences and Publishing International Ltd; 2013. p. 127.
44. 'Plagiarist' to sue university. *BBC News*. 2004 May 27. Available from: <http://news.bbc.co.uk/1/hi/education/3753065.stm>
45. Collis J, Hussey R. *Business research: A practical guide for undergraduate and postgraduate students*. 4th ed. Basingstoke: Palgrave Macmillan; 2013.

46. Cook MC. The role of the academic supervisor for undergraduate dissertations in science and science-related subjects. *Stud High Educ.* 1980;5(2):173–175. <http://dx.doi.org/10.1080/03075078012331377206>
47. Herman C. Obstacles to success – doctoral student attrition in South Africa. *Perspect Educ.* 2011;29(3):40–52.
48. Mouton J. Doctoral production in South Africa: Statistics, challenges and responses. *Perspect Educ.* 2011;29(3):13–29.
49. Smith RL, Maroney K, Nelson KW, Abel AL, Abel HS. Doctoral programs: Changing high rates of attrition. *J Humanist Educ Dev.* 2006;45(1):17. <http://dx.doi.org/10.1002/j.2161-1939.2006.tb00002.x>
50. Why I write for an essay mill. *Times Higher Education.* 2013 Aug 01. Available from: <https://www.timeshighereducation.co.uk/comment/opinion/why-i-write-for-an-essay-mill/2006074.article>
51. Bosch X, Ross JS. Ghostwriting: Research misconduct, plagiarism, or fool's gold? *Am J Med.* 2012;125(4):324–326. <http://dx.doi.org/10.1016/j.amjmed.2011.07.015>
52. Scott P. *The meanings of mass higher education*: Buckingham: Open University Press; 1995.
53. Houle CO. *The design of education*. 2nd ed. San Francisco, CA: Jossey-Bass Higher & Adult Education Series; 1996.
54. Dante E [pseudonym]. The shadow scholar: The man who writes your students' papers tells his story. *The Chronicle of Higher Education.* 2010 November 12. Available from: <http://chronicle.com/article/The-Shadow-Scholar/125329/>
55. Goodchild LF, Wechsler HS. *The history of higher education*. ASHE Reader Series. Boston, MA: Pearson Custom Publishing; 1997.
56. Newman JH, Turner FM. *The idea of a university*. New Haven, CT: Yale University Press; 1996.
57. New Zealand Qualifications Authority. *Effective practice in preventing and detecting academic fraud* [document on the Internet]. c2013 [cited 2015 Aug 04]. Available from: <http://www.nzqa.govt.nz/assets/Providers-and-partners/NZQA-Effective-practice-guide.pdf>

