

# A Mexican strategy to promote greater ethics in academic communications through nation-wide access to Turnitin

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## Abstract

This document explores the challenges and perspectives behind the initiative for enabling Mexican universities and research centers to access the Turnitin software, a strategy for promoting greater ethics in academic and scientific communications. It presents information obtained through documentary research, from the experience of using the software during the last academic semester, from interviews with the coordinator of the National Consortium of Scientific and Technological Resources (CONRICyT), and with the Turnitin company representative for Mexico. Given the emerging nature of this project and the complexity of the issue, the results presented consist of a non-comprehensive list of benefits and challenges that emerged from using the software, as well as recommendations to harness its use and consolidate a culture for the ethical use of information in academic and scientific communications.

## Keywords

academic plagiarism, anti-plagiarism software, CONRICyT, ethics in academic and scientific communications, Mexico, Turnitin

## Introduction

Academic plagiarism is a wide and complex topic, worthy of being studied from diverse perspectives, with different methodologies, within distinct scenarios and with several kinds of participants. However, there is limited research on the topic within Latin America. Plagiarism is characterized as a widespread misconduct, but it “is poorly acknowledged and discussed in the academic setting, and insufficient evidence exists in Latin America and developing countries to inform the development of preventive strategies” (Carnero et al., 2017: 1183).

This article offers a brief overview on the academic plagiarism issue as a research area and it presents the initiative for enabling Mexican universities and research centers to access the Turnitin software. Such

a nation-wide project is the responsibility of the National Consortium of Scientific and Technological Resources (CONRICyT). This document analyzes Turnitin’s implementation in Mexico and identifies some benefits, challenges, and recommendations about its use.

## The issue of academic plagiarism

Worldwide educational and research systems are giving increased attention to academic plagiarism, both

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for extra-academic reasons and because of the detection and denouncement of plagiarism cases committed by public and political officials. However, this is an emerging research field in the Latin American region.

After studying the specialized literature, Carnero et al. (2017) compiled the following causes behind plagiarism: a) lack of training on research ethics and conduct; b) deficiencies in the development of writing skills; c) tolerance to such misconduct; d) lack of institutional policies or supervision from academic and research stakeholders; e) poor awareness, lack of information or misunderstanding about what is considered misconduct and the use of intellectual property; f) the prevalence of corruption; and g) cultural values.

There are few regional and national studies on the topic. Hence, researchers usually attempt to interpret to what extent the research findings from other countries may contribute pointers and propose pathways for studying regional and national realities. Hernández (2016) conducted one of the few national studies, by interviewing a group of 51 researchers belonging to the National System of Researchers (NSR) about their conceptions toward plagiarism and how they deal with plagiarism cases; finding that: a) researchers condemn plagiarism and consider it a felony; b) they believe the causes behind plagiarism include deficiencies in students' and researchers' training, the absence of serious penalties, lack of understanding that it is an infringement, and because of institutional pressures for researchers to increase their publications; c) they have not used anti-plagiarism technologies for its detection; and d) they had rather not get involved in penalties when the cases are close to them, but they have indeed sanctioned students by failing their assignments and recommended the rejection of articles, when they are blind reviewers. The author of this study warns that indifference might be "fostering the increase of plagiarism cases, due to the fact that there are no serious consequences for offenders" (Hernández, 2016: 131).

At a national and regional level, we found that, due to the lack of studies on the topic, the percentage of involuntary and voluntary plagiarism cases are unknown; nor do we know the specific causes behind plagiarism. It could be argued that in the case of undergraduate students, it might involve the lack of competences for dealing with academic texts, as this weakness is generally carried forward from previous educational levels. The analysis of the European case

suggests that one possible cause is related to new university educational models, which evaluate students through constant assignments involving research and a direct use of information (Sureda-Negre et al., 2016).

CONRICyT was created in 2010, a consortium resulting from the alliance between the Secretariat of Public Education (SEP), the National Council for Science and Technology, the National Association of Universities and Higher Education Institutions, and six of the largest Mexican public universities and research centers. Its purpose is to "expand and streamline the access to scientific information –through world-renowned databases and scientific journals – for higher education institutions and research centers in the country" (CONRICyT, 2017: para. 2). Almost eight years later, the Consortium has increased the offer and access to information resources for all scientific disciplines, overcoming technical difficulties, the diversity of interests, indifference, financial limitations and other obstacles. The Consortium benefits students and professors, by providing them with access to information resources anywhere in the world, and it also benefits the more than 27,000 NSR members.

According to the Consortium, the ease of access to information and technologies facilitates copying, hence, professors are faced with the problem of detecting plagiarism and "during last year, the academic integrity of our country's educational institutions has been severely damaged" (CONRICyT, 2016: para. 2). This resulted in the evaluation of several anti-plagiarism platforms, from which Turnitin was selected.

## Turnitin

A software developed by doctorate students in 1998 at University of California, Berkeley was the precursor to Turnitin as a company. According to current data from Turnitin, their software is used by more than 30 million students in 15,000 institutions and 140 countries, and it is available in 18 languages. This makes it the most successful software of its kind, from a commercial point of view. The company offers services for mitigating the risk of academic and professional plagiarism and tools for supporting teaching and learning (Turnitin, 2017: para. 1).

In Mexico, the access to Turnitin for most professors-researchers and students affiliated to

public higher education and research institutions has been possible through the contract made by CONRICyT. This was an assertive decision, because very few universities would have taken such decision by on their own. The Turnitin company representative for Mexico states that such licensing deal is unique throughout Latin America, but similar initiatives have occurred in the United Kingdom (where 98% of the institutions use Turnitin), Pakistan and Nigeria (Garza, 2017, personal communication).

### How does Turnitin work?

There are three types of plagiarism-detection software: a) those that match the presented texts to files and texts on the Internet; b) those that confront them with documents on a database integrated by previously compiled works; and c) those that conduct a double comparison, with the Internet and its database (Mut, 2012, cited by Comas, Urbina and Gallardo, 2014). Turnitin is a tool of the third type, as it checks for originality by confronting texts with the local database of other works and online information sources.

In Mexico, in order to have access to Turnitin, it is necessary to belong to a public university or research center affiliated to CONRICyT. Professors or researchers interested in accessing the software must fill out a questionnaire in the Consortium's website and using an institutional email, they get a Turnitin account number and password, which they can use to have access through the software's official website<sup>1</sup>. The user can select an instructor and/or student profile.

As instructor, the interface allows creating courses, for which it is necessary to have the academic program's code and students' academic level. Then, a number and an access code are generated for the class, which students must use to login to the course and upload documents; instructors can also enroll students manually.

The platform allows generating activities with different characteristics, add instructions, evaluation criteria, deadlines and other details. Students can be allowed to upload a certain work several times to check its originality and rewrite it until deadline; this promotes the practice of conducting permanent revisions and fosters collaborative work, if combined with the use of forums.

In a few minutes, Turnitin generates reports that indicates the percentage of the document that is not

considered original, by having identified similarities with other documents. It also highlights where these coincidences lie. Several filters can be established to increase the precision of these results, for instance, instructors can opt for not confronting fragments within quotation marks, and the references section.

Regarding why Turnitin was selected, instead of other software, CONRICyT's coordinator claims that other available options were evaluated. The evaluators considered that Turnitin was the best option and offered compatibility advantages with open source platforms (Ontiveros, 2017, personal communication). After CONRICyT made the contract, 64 of the main public universities and research centers received access (CONRICyT, 2016). Although this number of institutions seems small, it corresponds to the main Mexican higher education and research centers.

### Is the use of anti-plagiarism software the solution?

This is a somewhat controversial topic. Given Turnitin's popularity, there is available research, mainly within English-speaking contexts, that describes its incorporation to academic life. Such studies recognize its usefulness to discourage and detect plagiarism, but without losing sight of its limitations and suggesting its use to support students' training, not exclusively as an instrument to catch offenders (e.g. Khoza, 2015; Li, 2015).

Brabazon (2015) thinks that although such software can discover plagiarism cases, we should prioritize prevention above all, as "it is easier to pay for an application and a database than to invest time and money to prevent plagiarism" (p. 15). The solution for this author does not lie on software, but on educational programs, specifically on information literacy, which acknowledge and assert the importance of libraries' participation.

In order to fight academic fraud, Sureda-Negre et al. (2016) suggest that three types of devices are usually implemented: a) normative or regulatory; b) formative and informative; and c) detection mechanisms. Turnitin would especially correspond to the third device. These authors analyzed the academic honesty guidelines from 72 universities located in Spain. Although they found that many of these regulations are outdated or incomplete, at least they exist. In Mexico, there are few universities with clear and specific guidelines related to academic fraud,

including plagiarism. They also generally lack integral strategies to face it.

According to Bruton and Childers (2016), the usual criticism of using software such as Turnitin is that, apart from being ineffective and rude, they damage the cordial relationship between students and professors. This aspect requires special attention, regardless of the software adopted. Carnero et al. (2017) implemented a 'zero-tolerance' strategy in Peru, which consisted in the application of different academic sanctions, depending on the seriousness of the plagiarism. This policy was complemented with preventive actions, such as increasing training on research integrity and scientific writing, establishing clear university guidelines on diverse ethical aspects, and examining every academic work to detect plagiarism cases.

### **Advantages identified during a semester-long experience**

This section presents the main experiences gathered from using Turnitin throughout one semester in courses aimed at developing writing and research competences. The objective of these notes is not to present a technical or complete evaluation, but to advance an initial categorization of experiences, benefits and challenges, from which a line of research can be developed.

Although Turnitin was used for a short time, we could observe that its characteristics transcend those of similar tools, especially the ones that are free to use, which were the most commonly used; and despite the fact that the version contracted by CONRICyT does not include all its features. Students expressed varied opinions on the tool, some of them identified it as a fiscalization mechanism to detect plagiarism and hence they perceived it with a certain displeasure; while others welcomed the opportunity of being able to check their work and obtain precise feedback on its originality before handing in the final version. We believe the tool enabled students to have a more reflective practice in academic writing, especially among undergraduates working on their theses, as they could evaluate the originality of their work. It is important to highlight that students that participated in activities involving the software were from social sciences and humanities, as these students usually have a greater sensibility toward the importance of writing correctly.

An important benefit of the software is that it allows evidencing students' contributions, meaning, the originality of their work. Regardless of the correct

handling of citations, in documents such as essays, it is important that students include their own ideas and that they write them under their own expressive means. An additional and unforeseen advantage was that the software allows detecting badly-written paraphrases, a frequent situation. Turnitin allows observing, in a graphical way, when the student only changed a few words from the original text.

In summary, the experience of including an activity in the courses that had students check their work through Turnitin was positive. The feedback they received on the aspects of their work where they had to pay more attention before handing in, proved more precise and appropriate than the feedback they could have received from their professor without Turnitin's support

### **Challenges and perspectives**

The software's availability is recent, approximately 18 months ago at the moment of writing this document; this is why it is important to highlight that these kinds of projects require more time to evolve and mature, as the adoption of new technologies tends to be slow. However, according to CONRICyT's coordinator, a thousand professors have requested their password, an average of 2.5 courses by professor have been created, and 15,225 documents have been analyzed and contributed to the database (Ontiveros, 2017, personal communication).

Turnitin's usage can be framed within the utilization culture of any digital resource. Due to several reasons that are not possible to tackle within the scope and space constraints of this work – e.g. insufficient English proficiency from professors and students – the harnessing of such digital resources is reduced in Mexico. Fortunately, Turnitin has a Spanish version, although we found that some sections of its interface are still not translated or their translation is not clear. Additionally, support resources are only available in English.

Although Turnitin is a friendly tool, it is recommended to provide introductory training for professors to facilitate its use, avoid them to get frustrated when they face possible obstacles, socialize its advantages, and ensure that they are able to harness the benefits of its use. Turnitin workshops should become usual in universities and research centers, and they can be taught by library staff.

A high percentage of professors are used to develop their didactic plans for the semester and they hardly stray from this during that semester. It is

important to register the activities involving the use of Turnitin in such plans, so periods between semesters are key to raise awareness about the tool and train professors.

There is a need to establish indicators to evaluate Turnitin's usage and plan for the adequate moment to acquire the features and modules that were not contracted by CONRICyT. For instance, the Feedback Studio module, which fosters professor-students' bidirectional communication and strengthens critical thinking (Garza, 2017, personal communication).

A challenge is finding appropriate ways to introduce this software to students as a means to support their learning regarding the writing of academic documents and prevent them to see it as a prosecution instrument. Turnitin must be used as an ally for students to discover citation dynamics and their importance. It would be useful to design and share strategies and best practices to prevent professors from improvising.

### Conclusions and recommendations

In order to get good results in the promotion and development of a culture for the ethical use of information in academic and scientific communications, higher education and research institutions should put their efforts in three aspects: a) normative or regulatory; b) formative and informative; and c) detection mechanisms. Such efforts must privilege the implementation of preventive strategies and work for correcting inappropriate behaviors or practices. Turnitin can support this kind of work, as it helps students to understand, within real situations, how they have to register citations and references, and how they must construct paraphrases, in order to avoid academic plagiarism.

The success of Turnitin's national implementation would mainly depend upon the kind of promotion and usage it can get within each of the institutions with access to it. Information professionals and professors have a lot to contribute in driving this; mainly those concerned with having students develop their competences for using information efficiently and ethically, and assuming such competences as daily practices.

Although we have mainly centered on academic plagiarism committed by students, by moving the issue to the research and scientific publishing arena, it could have serious consequences such as articles' retraction. Almeida et al. (2016) detected 18

retractions in journals indexed in the SciELO database due to plagiarism; which can be "used as signposts to inform discussions in Latin America on plagiarism and research integrity" (p. 1447).

The authors of the present article, information professionals and professors in frequent contact with the plagiarism topic, sympathize with this nation-wide initiative by CONRICyT. However, we consider that we must tackle diverse challenges before being able to harness Turnitin's possibilities and for supporting the promotion of academic and scientific communications of a greater quality. We believe that the topic of plagiarism and the software used for its detection represents a novel line of research in Mexico and Latin America.

### Declaration of Conflicting Interests

The authors wish to state that there are no conflicting interests regarding the subject of this article. We do not have any indirect/direct (commercial or financial) interest in benefiting, nor promoting, Turnitin over other plagiarism detection software.

### Note

1. <http://www.turnitin.com>

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