# AVOIDING PLAGIARISM IN STUDENTS' WRITTEN WORKS: EXPERIENCE OF LLU

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Abstract. The article presents results of research on investigation into scope of policies and measures, used for plagiarism prevention in students' written works in university investigated in context of measures, proposed by authors of scientific publications, and evaluation of findings. Plagiarism is declared as unacceptable behaviour in legal acts and institutional regulations, but students are plagiarising and higher education institutions (HEIs) are trying to make barriers for this kind of academic dishonesty. Using methods of monographic analysis, logical analysis and comparison it was made analysis of scientific publications which show the careful implementation of ethical norms, policies and procedures on plagiarism prevention in HEIs allow reaching significant progress in avoiding of plagiarism. Using methods of analysis of legal and institutional regulations, face-to-face and telephone interviews it was made analysis of plagiarism prevention measures used in university investigated and discussed impact of these measures and recommendations for other HEIs in Latvia and beyond.

**Keywords:** quality of studies, plagiarism, prevention measures.

#### Introduction

Nowadays the information and communication technologies are widely used for information search and processing not only in business, but and in studies process. Seeing a lot of information published on the Internet could be given impression that this information is like public good. But all scientific and research publications has their author or authors and the property rights owner or owners. The obligation to provide citing and referencing of used literature and other sources comes not only to professional researches or projects developers, but also and to students, who are preparing their essay, homework, coursework, project and final work of studies.

Plagiarism is declared as unacceptable behaviour in legal acts and institutional regulations, but students are plagiarising and HEIs are trying to make barriers for this kind of academic dishonesty. The cases of plagiarism could be found in students' written works around all over the world. But more cases of plagiarism could be met in countries having comparatively poor legal regulation on copyright and quality of studies. Also, plenty of plagiarism cases in HEIs could be influenced due to missing of ethical norms, policies and procedures on plagiarism prevention.

Appearance of plagiarism in students written works could be influenced and by unclear understanding the plagiarism and ignorance of requirements of proper academic writing. Plagiarism could be differently understood and penalised by different teachers. Due to this the plagiarism often becomes as a moral maze for students – having unclear understanding what behaviour is appropriate they deal with a moral and ethical dilemma. Therefore the institutions and academic communities are suggested to analyse situation on this issue and should try to implement most efficient measures for preventing of this phenomena.

The main purpose of research presented in this article it was to provide investigation into scope of measures, used for plagiarism prevention in students' written works in university investigated in context of measures, proposed by authors of scientific publications, and to evaluated reached results as well as to provide recommendations for improvement situation in the future.

## Materials and methods

The research, results of which are provided in this article, was provided in years 2012 and 2013 in frame of implementation of international project "Impact of Policies for Plagiarism in Higher Education across Europe" (IPPHEAE). At first stage of this research it was provided analysis of scientific publications, analysing plagiarism nature and concepts as well as policies and procedures of prevention of it. At the second stage it was provided analysis of some national and institutional documents, most of which were accessible via Web sites of state institutions or university investigated, but some were received only on request from representatives of these institutions. At the third stage in September 2013 it was conducted interview with top managers of studies in university investigated and at the fourth stage it was provided clarifying and summarising of gathered information.

The interviews were conducted in two ways: by telephone calls to respondents and face-to-face conversation. The potential respondents of the case study survey before the face-to-face interview received the following questions:

- 1. Which most important issues influenced necessity to take some actions?
- 2. Which are most important legal regulation of plagiarism prevention in the country and what are main aspects of them?
- 3. Who and why (events, problems) influenced activities of approval of internal regulations?
- 4. What actions really where taken in institution to prevent plagiarism in students works?
- 5. What are practices of organising/providing students teaching/training in your institution?
- 6. What are practices of software use for plagiarism detection in your institution?
- 7. What aspects from your institution could be used in other institutions?
- 8. What problems are still not solved and what are reasons for this?

During face-to-face interviews there were discussed these and some other closely connected aspects of institutional level regulations and practices on plagiarism search and prevention in students' works in light of state legal regulation. Clarification of provided answers was continued during telephone or Skype calls.

For investigation in plagiarism prevention measures and practices of implementation of these measures there were used methods of analysis of scientific publications, logical analysis and comparison. For preparation of questions for structural interview it was used methods of logical analysis and summarising, for data collection it was used questionnaire adopted for top managers of studies and face to face interviews. For summarising of collected data there were used methods of logical analysis and comparison.

## Results and discussion

Measures for Plagiarism Prevention Proposed in Scientific Publications

More active investigation in problems of plagiarism prevention in students' written works was started in last decade of last century. The phenomenon of plagiarism is known for a long time and some measures for prevention have been used. But in about 1999, after increase of plagiarism cases in universities of United Kingdom, the discussions on this issue became more active started. At first stage the responsibility for plagiarism prevention it was delegated to individual lecturers, but in short time it was understood the measures, previously used for plagiarism deterring, became insufficiently effective in case of intensive use of information and communication technologies in study process.

After the year 2000 the higher educational institutions in UK started deeper investigation into problems of plagiarism in students' written works. At that time the number of publications appeared in which there were provided results of analysis of this problem as well as proposals how it could be solved. At that time and holistic approach for plagiarism prevention it was suggested. The holistic approach towards plagiarism prevention claims, that it is impossible to reduce the extent of plagiarism in higher educational institutions, applying separate or isolated measures. This approach and ways of implementation of this approach in practice it was analysed in works of following scientists: Carroll and Appleton [1], Bretag [2], Joyce [3], East [4] and others. As one of the most important principles of holistic approach concerning plagiarism prevention it was proposed creation of intolerant culture to plagiarism [1]:

- have been created culture of involving and engaging students: lecturers should have to provide interesting tasks, to explain them and be open to students' opinions and ideas;
- academic culture in institution must be an example of good experience to students lecturers have to apply the same requirements to the students as to themselves;
- safe presentation and system of evaluation of written works have be made in such way, that students could not take work of other student, works could not be lost, each student have been informed about advantages and disadvantages of the work and get remarks from the lecturer.

Sims [5] indicated that academic integrity could be improved by formalising procedures. One of the examples of such procedures is when students at the end of every work have to sign a declaration, that the work was done by the student himself without any help from outside, that the work contains references to all the sources, quoted or paraphrased in the work, quotation marks were used in the work if more than three words were written one after another from the other author's work, that written work was specially prepared for this study subject.

HEIs, following holistic approach, by Macdonald and Carroll were invited [6]:

- to equip students with appropriate information and skills in the context of scientific (academic) attitude;
- to educate the personnel about appropriate attitude towards formation of skills and preparation of tasks skills should be acquired, tasks should not encourage plagiarism and all this have be stimulated by institutional administration;
- to acknowledge that students, entering higher educational institutions, are not properly prepared to apply approved institutional regulations and procedures in their studies and are not able quickly understand the requirements, provided in code of academic ethics or other internal documents.

Atkinson and Yeoh maintained three main elements in the system of plagiarism prevention [7]: teaching and preventing, applying measures for plagiarism detection and applying penalties for plagiarism. Barrett et al. proposed to include more elements of this system: clear and open procedures at universities, informing students how to use information sources and quote them, removal of plagiarism-friendly conditions and provision of checking of plagiarism cases [8].

In some period of time many people were impressed by use of computer software for plagiarism prevention and thought that it is a good solution to this problem. But later on they maintain that "computer allows only a short-term effect seeking to increase the role of long-term educator" [9]. The best measure for plagiarism prevention by opinion of these authors is students' education. Students have be required to write individually and provide original works, involving them in search of suitable sources and research methods as well as use of critical analysis in problem solution. Also, students' writing skills and abilities have been reinforced.

To prevent plagiarism in students' written works Šarlauskienė proposed following measures [10]:

- formation national plagiarism prevention policy (encouraging ethical public culture, informing and educating the society, development of official educational system, formation of attitudes on academic ethics, enabling formal documents, institutes and procedures);
- formation institutional policy of plagiarism prevention and procedures (encouragement of academic integrity, adoption of official documents and procedures, implementation of responsible centres, allocation of responsibility and improvement of study process);
- application of measures for plagiarism prevention in the study process (informing and teaching students and personnel, proper preparation of tasks for students);
- use of measures for plagiarism detection (installation and use of legal and proper software).

Legal and Institutional Regulations on plagiarism prevention in Latvia

Providing research of legal environment of plagiarism prevention in Latvia it was made analysis of Copyright Law [11] and Law on Institutions of Higher Education [12].

The objects, protectable by Copyright Law, are defined in following way: "Copyright shall apply to works of literary works (books, brochures, speeches, computer programs, lectures, addresses, reports, sermons and other works of a similar nature), also unfinished works, regardless of the purpose of the work and the value, form or type of expression" [11].

The Law on Institutions of Higher Education established the state regulation on functioning of higher education institutions and principles of study quality assurance, sources for financing of activity of these institutions, relationship with the students and on other important aspects. The autonomy of HEIs in Latvia in the law is defined in following way: "The autonomy of an institution of higher education shall be expressed in appropriate and efficient utilisation of financial and material resources, and compliance with the principle of democracy and with the laws regulating the operation of institutions of higher education and other regulatory enactments" [12].

According the Law on Institutions of Higher Education HEIs shall implement their internal quality assurance system, within the scope of which are the following [12].

- 1. A policy and procedures for assuring the quality of higher education shall be established.
- 2. Mechanisms for the creation of their study programmes, for internal approval, for supervision of activities and periodic inspection thereof shall be developed.
- 3. The criteria, conditions and procedures for evaluation of students' results shall be developed and made public.
- 4. Internal procedures and mechanisms for assuring the qualifications of academic staff and the work quality shall be developed.
- 5. It shall be ensured that information regarding student results, graduate employment, the satisfaction of students with the study programme, the work effectiveness of academic staff and the other essential indicators of activities HEIs are compiled and analysed.

In mentioned above legislation there are no provided definition of plagiarism and (or) other forms of academic dishonesty, but institutions of higher education are obliged to create and implement the internal studies quality assurance system and have to provide regularly self assessment and improvement of this system. The Ministry of Education and Science of the Republic of Latvia ensures development and implementation of a policy in the fields of higher education.

In university investigated the problems for plagiarism prevention are dealt in following internal documents (some of these documents are available publicly via Internet and some only for academic community of particular faculty via Intranet).

- Codex of ethics (Ētikas kodeksa) [13].
- Concept of intellectual property management (Intelektuālā īpašuma pārvaldības koncepcija) [14].
- Internal rules for students (Iekšējās kārtības noteikumi studējošajiem) [15].
- Regulation of study process (Studiju nolikumu) [16].

The mission of Code of Ethics of university investigated is defined in following way: to monitor the code of ethics of ethical standards and to review complaints on violations of principles and rules the code, including any student, faculty or staff member for unethical behaviour. Among the others basic requirements for students' ethic as unacceptable behaviour is defined "falsification of records, cheating, as well as plagiarism – use of another writer or speaker ideas, phrases, sentences or longer passages without proper authorization or appropriate references" [13].

University investigated provides a certain goal-oriented diverse academic, research and innovative activities, thus creating the need for protection of obtained results, containing variety of different intellectual property types. Due to this reason the Concept of intellectual property management it was approved and there were foreseen main principles and ways, following which the protection of university teachers, researchers and students intellectual property rights is going to be preserved [14].

In the Internal rules for students are defined the students' responsibilities, for example, the requirement "Do not use unauthorized materials in tests and aids to prevent plagiarism in study works" [15]. Disciplinary measures for internal policy violation, such as warning of the Dean of the faculty, and rules of application of these measures are provided in this document. Most strict measure is exclusion the person from the list of students. It could be applied "if the student has used another person's spoken or written thoughts, inventions or discovery or further expressed in his own name, that is, they are named for their" [15].

According Regulation of study process of university investigated "Plagiarism is expression on own name another person's spoken or written thoughts, inventions or discoveries i.e. without reference to the author" [16]. Among the other responsibilities of the students' in this document is provided request "to comply with the rules and procedures for students of university investigated and other documents of internal regulation of this university" [16].

According Regulation of study process students can be ex-matriculated at the Dean's or Vice-Rector's proposal "in case of unfair studies, i.e. appearance of plagiarism or unauthorized materials in examinations and other violations of academic ethics" [16]. Unfortunately, in this document there are not provided procedures, which have been taken in case plagiarism in student written work was obtained, and penalties could be applied.

Each faculty of the university investigated had methodological guidelines, approved by Councils of these faculties, for preparation of written works, in which, taking into consideration the specifics of particular studies directions, are provided more detail and clear requirements for preparation of all written works for both (bachelor's and master's) levels students. Also, requirements for citation and referencing, including various examples, are provided in these regulations.

Measures for plagiarism prevention taken in university investigated

During research it was provided structured interviews with participation of top level studies administrators in university investigated. The respondents participated in the survey were asked to answer the questions, presented into section Materials and methods of this article. The results of this investigation are shown below.

The most important reasons to start investigation on measures for plagiarism prevention in university investigated were the same as in other HEIs of Latvia – intensive use of information and communication technologies in studies process and fast growth of information available via Internet. Representatives of the university investigated pointed out, that these problems are more important in faculties providing similar or closed in their nature study programs as in other universities. Following the requirements of Law on Institutions of Higher Education of the Republic of Latvia, university investigated created system of quality of studies, taking into consideration all important aspects, influencing quality of studies.

The system of quality of studies in university investigated was created the following measures for deterring plagiarism in students' written work there were foreseen [12]:

- teaching and training of bachelors and masters level students on correct citing and referencing;
- consulting of students on correct citing and referencing through courses, in which written works have be prepared, and during preparation of final works of studies;
- focusing efforts on checking of progress of students' in process of preparing written works.

The topics on rational literature sources search, analysis, correct citation and referencing are foreseen in regular courses for bachelor level students at the first year of studies and these topics are provided in course Introduction to studies by employees of Library of university investigated. Practices of correct citing and referencing of literature sources students obtain in process of preparation written works and through feedback from teachers' consultations.

The courses of scientific research methodology are foreseen not only for students of all masters level study programs, but also for students of some bachelor's level study programmes. The duration of preparation of bachelor's final works last from one till one and half year. Students receives detail plan of activities have be taken in preparation of final work and have to provide regularly the results of takes actions to supervisor for checking. The same system of progress control is applied and for masters level students in period of preparation their thesis, which also takes one and half year.

Detail layout of requirements for referencing, including examples of various possible cases, is provided in methodological guidelines for preparation of written works, which are available only in Latvian language. At the end of final work and in some cases on request of teacher at the end of project the students have to provide and sign declaration of originality of provided work. As one of possible example of such guarantee declaration could be the following sentences: "I assure that the master's thesis is written independently. Work is not copied from other sources, definitions and quotations are shown in the references, work is not published and is first submitted to the defence for the Master Examinations Commission".

The collection of bachelors and masters final works as far as doctoral thesis in PDF format in CD in the university investigated it was started in 2008. The responsible specialists are uploading these works into local repository, but not providing checking of possible plagiarism cases in these works. The university investigated signed agreement on creation of State level repository for final works, but due to various reasons which were not clearly opened during structural interview are not uploading final works to this repository.

In case of necessity, teachers of the university investigated use the Google or other tools for information search in Internet for detecting possibly plagiarised documents by keywords or specific phrases. These tools allow finding the potentially plagiarised documents, stored in open access databases or web sites of HEIs or others institutions.

Discussable aspects and recommendations for HEIs in Latvia and beyond

During interviews with top level studies administrators in university investigated the author of this article got impression that necessity of creation of national level repository for storage of all students' written works and role of such repository for search of plagiarism cases in newly uploaded works is still discussible question in Latvia. Taking into account viewpoints of various authors it is unreal to expect that use of software should allow solving all problems dealing plagiarism, but most authors analysing problems of plagiarism prevention in students' written works are paying attention to psychological effect on students' behaviour in case they know about existing infrastructural possibilities for plagiarism cases search. Also, as pointed out Stabingis et al. [17] in most cases students are trying to plagiarise written works prepared by students from other universities expecting teachers wouldn't be able to detect this fact and this is very serious problem for teachers, working with students attended social sciences studies programs.

Significant role on plagiarism prevention in students' written works had careful and detail planning of activities, which have be taken in process of preparation of bachelors and masters final work. The draft of the work has been regularly provided to the teacher for checking. Teachers, analysing drafts of students' works are able to have positive influence not only on increasing of quality of these works, but and serves as very effective measure for prevention of plagiarism. The success of such plagiarism prevention measure could be reach in case it is foreseen time for such activities in teachers' working time structure and teachers' responsibility for the quality of consultations.

Positive impact on plagiarism prevention in students' works could have strengthening of legal regulation in intellectual property protection and plagiarism discouraging in scientific publications, because insufficient strict viewpoint of some teachers' to rules of citing and referencing had negative influence to students' behaviour. It is advisable the state institutions should take the role of initiator and coordinator for preparation and adoption of common requirements for citing and referencing to be facilitated process of text overlapping cases search and plagiarism identification while comparing works, prepared by students from different HEIs. Also, the state are welcome to provide legal and financial support for creation of national level repository for storage of students' written works, including common guidance for preparation of these works and uploading into such repository.

Universities have to define as much as it is possible clear plagiarism and other forms of violation of academic integrity. Detail definitions should allow students more clear understand these concepts and studies administrators to identify and appropriately punish such cases. Also, universities have to organise careful and detail planning of activities should be taken in process of preparation of bachelor's and master's final works and regular checking of students' progress. Teachers, regular analysis of drafts of students' works could influence positively the general quality increase of these works and could serves as very effective measure for prevention of plagiarism and presentation of works, prepared by other persons.

Individual academics have be more open and closely communicate with the students, who are preparing written works (obligatory attendance for consultations allows teachers to follow students' progress in preparation of written work, increase its quality and should have natural positive influence on plagiarism prevention) and have to prepare as much as it is possible original and innovative tasks for assignments of final works and regularly renew them.

#### Conclusion

HEIs in Latvia made a lot of efforts in formation of policies and procedures for prevention of plagiarism and other forms of academic dishonesty in recent years.

Advisable practice for other HEIs in Latvia and beyond is careful and detail planning of activities, which have be taken in process of preparation of bachelors and masters final works and regular checking of students' progress. Teachers, regularly analysing drafts of students' works are able to have

positive influence on increasing of general quality of these works and serves as very effective measure for the plagiarism prevention.

Use of the repository for storage of all students' written works and software for search of similarities in newly updated works could have a great impact on both deterring and detecting plagiarism in HEIs in Latvia, but only in case all influencers of study process – i.e. state institutions, HEIs and individual academics should follow recommendations, provided in subsection of discussions of this article.

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