

The Attitude of Students in The Information and Documentation Degree Program toward Ethical Values

Margarita Pérez-Pulido

Department of Information and Communication, University of Extremadura, Spain

Aurora González-Teruel

Department of History of Science and Documentation, University of Valencia, Spain

In European universities, teaching ethics has acquired special relevance with the Bologna Process and changes in curriculum. In Spain, the White Book of the Degree in Information and Documentation incorporates ethics as a specific competence, through the combination of ethical, social, and legal content, as a transversal competence. In this context, this study aimed to detect whether changes in attitude toward ethical values occur in a group of LIS students as a consequence of the training received and to test a qualitative approach to identify these changes. A questionnaire based on the vignette technique was used, presenting students with cases of conflict or ethical dilemmas, in most cases in the context of an information unit. For each vignette, they were asked to assess the performance of the information professional and to explain what they would have done if they were in their place, before and after they received the training. The results obtained showed that the attitude of the students who received training changed from individual ethics to professional ethics. We can consider that the content used for the training was correct, although the knowledge about the different ethical theories and ethical reasoning models for decision making should have been deepened. To the theoretical content, we must add a teaching methodology based on the effective study of cases and scenarios in our work. On the other hand, the application of the vignette technique and content analysis as a methodological approach to the students' discourse is very useful, since it was decisive in identifying the reasons that helped the students make a certain decision, before and after the training session, for checking to see whether this decision was made following their individual ethics or guided by normative ethics, and for knowing the degree of acceptance and depth of the training session.

Keywords: attitudes, ethics, library and information science degree, Spain

The teaching of ethics and its practice is a highly topical issue that affects different areas, under different points of view, always with the common objective to promote coexistence and the development of the society we live in. Obviously, the teaching of ethics is not a stable issue, as it evolves as much as society. That is why ethics present different perspectives, content, and learning methodologies at each moment in history and even in each social context. In any case, a question mark has always hung over what to teach in ethics training, how to do it, what methodology to use, and how it will influence the future of students and their professional practice. For this reason, for the design of ethics training programs in the context of library and information science (LIS) teaching, adapted to the real needs of students, it is necessary to continuously monitor their beliefs regarding the ethical values that they need for professional performance.

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KEY POINTS:

- The teaching of ethics should go in depth into the different ethical theories and models of ethical reasoning for decision making.
- Theoretical content should be studied together with case studies on ethical principles and professional values.
- By observing the students before and after the ethics training session, it was determined whether the decisions were made following their individual ethics or normative ethics.

Applied ethics is justified in the fact that each social activity has its moral demands and its values and guides decision making in specific cases (Cortina & Martínez, 2015). When defining what we should teach students, we can start from the insight of information ethics (Floridi, 2006). Floridi brings together in this term a series of moral considerations found in a variety of disciplines, including LIS, which are structured around information as a resource, product, or objective and which affect moral behavior in a given context. This is microethics as applied ethics of a professional nature in this particular discipline. In addition to this proposal by Floridi, we find the type of ethical theory on which to support

the theoretical basis of this learning, and that will mark the difference between moral judgment, thoughtful opinion on a problem, and ethical judgment, arguments that support the decision that is being made on a problem based on one or more ethical theories. Dias-de-Figueiredo (2009) defends a consensus between the ethics of responsibility, through which the student will learn to develop their own moral thinking and critical moral thinking, and the deontological ethics that set the scope of duty and will predominate in the professional world that the student will face in the future. On the other hand, the importance of teaching and research methodology in ethics in LIS is justified by Carlin (2003) in the need to use qualitative research methods and techniques typical of disciplines belonging to the social and human sciences, specifically, case studies from professional practice.

In the European university environment, teaching ethics has acquired a special relevance with the Bologna Process and changes introduced in curriculum. In the specific case of Spain, the White Book of the Degree in Information and Documentation (ANECA, 2004) incorporates ethics as a specific competence, through the combination of ethical, social, and legal content, and as a transversal competence, in the need to turn the student into a good citizen. Later, the documents arising from the Conference of Rectors of Spanish Universities (CRUE, 2005) include recommendations for incorporating ethical content into curriculum, introducing concepts directly related to ethics such as sustainability and social responsibility. Along with these references, some universities developed texts of an ethical nature, as is the case of the Peñalver Code of the University of Cádiz (Código Peñalver, 2005), which instills in professors the responsibility to provide ethical training of a professional and civic nature to their students.

Regarding the dimensions of teaching ethics in the university environment, Martínez Martín, Buxarraís Estrada, and Esteban Bara (2002) consider three ways to approach the subject: the deontological training of the student as a future professional, the deontological training of the professors to train the student, and the ethical training of the student to build a matrix of values to acquire appropriate behavior as a professional and as a citizen.

For this reason, these authors consider that the students' ethical learning in universities must contemplate aspects related to themselves as individuals, about the institution, and the society. In this way, [Byrne \(2017\)](#) establishes for an LIS professional a clear difference between moral behavior as an individual, as a professional, and as a member of an institution related to the LIS profession.

In the context of LIS teaching, different studies have addressed these aspects more concretely. In Spain, papers by [Jornet i Benito and Rodríguez Parada \(2001\)](#), [Pérez Pulido \(2004\)](#), [Giménez-Chornet \(2017\)](#), among others, present analyses on content, competencies, methodologies, or evaluation systems related to the subject. However, there is a document of great relevance in this area in terms of assimilating and accepting ethics as university content—namely, the recommendations of the Association for Library and Information Science Education ([ALISE, 2010](#)) that advise introducing theoretical and practical ethical content to enable ethical reflection and an understanding of conflicts and ethical dilemmas that arise in teaching, research, and professional practice. In this sense, the proposal of [Martínez Martín et al. \(2002\)](#) on how to teach ethics is based on [Kohlberg's \(1992\)](#) moral dilemmas theory and the use of learning techniques that offer values and counter-values so that students can create their matrix of personal values, guided by the theoretical and practical concepts learned, and thus be able to face any ethical conflict in the future. Hence, ethical decision making, rooted in adequate argumentation based on different ethical theories, constitutes one of the elements of interest to be included in ethics teaching and learning in all disciplines, as [Carbo \(2004\)](#) states when synthesizing the models used in LIS.

In addition, [Cohen and Cornwell \(1989\)](#) propose observing the change in students' attitude from the beginning of the ethics course until its completion, as they create their own individual ethics, using a pre-test and post-test design. [Strittmatter and Bratton \(2014\)](#) also use pre-test and post-test to study the change in students' attitudes toward plagiarism—specifically, from some training sessions based on scenarios and the application of a multidimensional ethics scale (MES), with questions designed in line with three ethical theories: contractualism, deontology, and cultural relativism. Similarly, [Granitz and Loewy \(2007\)](#) used this multidimensional scale to observe the behavior change in students regarding plagiarism, with scenarios categorized in six different ethical theories (deontological, utilitarianism, Machiavellianism, cultural relativism, social contract theory, and situational), on which to apply critical reasoning for decision making. These authors conclude that unethical behavior on the academic stage reflects unethical behavior on the professional stage and that university learning has a positive impact on the ethics of professional organizations. For his part, [Peslak \(2006\)](#) studied university students, using a questionnaire of situational short sentences, 10 factors of moral intensity, the components that influence ethical decision making related to the use of technology, and values such as access to education, information, and intellectual property. He concluded that the consequences of actions are found in the factor of moral intensity that influences them the most.

Other research has been carried out in the context of information and documentation that has empirically addressed the teaching of ethics and that allows an approach to the professional values that students should be taught, by theorists like [Finks \(1984\)](#), [Hauptman](#)

(1988), Froehlich (1997), and Gorman (2015). Among them, research conducted by Yerkey (1998) and Kirk and Poston-Anderson (1992) stand out, the objective of which was to detect differences or similarities in the acceptance of ethical values among professors, students, and professionals through a survey study with a Likert scale of values. Using the same methodology, Branch (1998) conducted a study focused on professionals from university libraries in North America, and Dole and Hurych (2001) did the same for students and professionals from the universities of Illinois and New York. Finally, the study by Horvat (2003) established the importance and priority of ethical values among Croatian librarians working in different institutions in that country.

Along with the previous studies, in Spain, some works were developed in the same way to evaluate professional ethical values. For instance, Cancho-Castellano et al. (2004) carried out a comparative study on this issue in Spain and Latin America, while Nieto Pino (2014) carried it out for librarians, archivists, and documentary makers in Extremadura. It is worth mentioning the work carried out by the SEDIC Ethics Group (*Grupo de trabajo de Ética de SEDIC, 2011*) through a survey of values carried out among Spanish professionals, as a basis for the design of the deontological code of Spanish LIS professionals, to know the degree of importance granted to a list of professional ethical values, and designed according to the content analysis of existing international codes of ethics. Finally, the study by Pacios and Fernández-y-Fernández-Cuesta (2019), on ethical values in Spanish university libraries, is relevant since it differentiates the existence of professional values and values related to public administration, which are well defined and coexist in harmony in libraries on the basis of documents and regulations of an ethical nature for the professionals who work in these institutions.

It is in this context that we frame this study, intending to detect changes in attitude toward the ethical values of a group of students of the Information and Documentation degree program (the official name of LIS studies in Spain) as a consequence of the training received, and to test a qualitative approach to identify these changes in attitude, a perspective that, as described, is not frequent in studies that try to observe this aspect.

Methods

To achieve the proposed objectives, we designed an exploratory study to determine and assess the dimensions that constitute individual ethics in a group of university students, and how these varied as a consequence of the training received in the field of professional ethics. It was based on the hypothesis that the personal values they have assumed as students change when they recognize, through training, that they must conform to the ethical values of their future profession.

The population included in the study was a group of 18 third-year students in the Information and Documentation degree program of a Spanish university, with an average age of 26. The curriculum of this university included a course with content on legislation but not on ethics.

The study was carried out in three phases. In the first, the participants were informed about the objectives of the study and the intended data-collection process. They then completed a questionnaire that featured five vignettes (see Tables 2–6). Vignettes are stories,

Table 1: Ethical principles and values in the vignettes of questionnaires 1 and 2

	Survey 1					Survey 2				
	1	2	3	4	5	1	2	3	4	5
Ethical principles										
Neutrality	x					x				
Professional values										
Intellectual freedom	x	x				x	x			
Access to information	x					x				
Privacy and confidentiality					x					x
Copyright				x					x	
Service quality			x					x		
Professionalism	x		x	x		x		x	x	
Loyalty to the institution		x					x			

generally short, about particular characters and situations that enable information to be obtained about attitudes or perceptions that are difficult to reveal using a more direct approach (Urquhart, 1999). Each vignette presented the students with a case of conflict or ethical dilemma, in most cases in the context of an information unit. Each of these five vignettes was related to one or more ethical principles and/or values, selected after analyzing some of the specialized texts described in the introduction and present in professional deontological codes (Table 1). For each vignette, the students were asked to assess the performance of the information professional and to explain what they would have done had they been in their place.

The second phase of the study consisted of a two-hour session in which the basic content related to ethics was taught in the context studied. In this session, general theoretical and terminological questions related to ethics and deontology were raised, as well as knowledge of ethical instruments, such as deontological codes, declarations, and other documents of a moral nature, and the importance of the law; specific professional ethical principles and values were explained, as was the ethical decision-making process.

Finally, the third phase of the study consisted of administering a second questionnaire with five vignettes. These vignettes were also related to various ethical principles and values but described different situations from those of the vignettes in questionnaire 1 (Table 1).

The data-collection questionnaire was a document in which the students freely wrote the answer to each vignette. Subsequently, this information was transcribed and analyzed through qualitative content analysis using the MAXQDA software. Finally, to ensure quality in the data-collection process, we followed the reliability criteria of Lincoln and Guba (1985), specifically, the dense and detailed description to facilitate the evaluation of transferability, and the elaboration of an audit trail with the materials and the sequence of

Table 2: Vignette 1 of the first and second questionnaires**(A) Questionnaire 1**

A public library has received a donation that includes the book *Mein Kampf* written by Adolf Hitler in 1930. The librarian has decided not to incorporate it into the collection due to its ideological connotations.

(B) Questionnaire 2

A councilman of Pamplona, a member of a certain party, refuses to sign the invoices for three acquisitions of the municipal library network. The materials acquired are a report on torture in the Basque Country, a video of the performance of some clowns who speak Basque, and an award-winning film that deals with the love between two adolescent girls. The librarians of the three libraries do not agree with this decision, and so they tell the councilman, claiming that they are the ones who must decide on the acquisition policy and that, in addition, they are materials requested by users.

the documents generated in the course of the investigation to ensure dependability and confirmability.

The data-collection process followed the ethical standards of social research, with each informant verbally granting their informed consent. At the beginning of the data-collection process, students were informed about the research (objectives and methods), the voluntary nature of the participation, the destination of the data collected, and the commitment to confidentiality and anonymity in the management of these data. Given this commitment, any identifying information of the informants was disassociated from the responses, and they were identified only by a code during the analysis of the information.

Results

The results presented below are organized such that two vignettes selected according to a situation of conflict or similar ethical dilemma can be seen, for the first and second questionnaires, as well as the students' answers before and after the training session.

Neutrality, intellectual freedom, and access to information

The first vignettes of the questionnaire referred mainly to the ethical principle of neutrality and the values of intellectual freedom and access to information (Table 2).

In the first vignette of the first questionnaire (Table 2A), 15 of the 18 responses obtained assessed the performance of the librarian negatively, and only two considered that the librarian had acted well by not incorporating the Adolf Hitler book *Mein Kampf* into the collection. An interviewee said he understood the librarian but did not share that way of proceeding.

Arguments that the librarian had acted wrongly referred mainly to two reasons: it is not the librarian's job to prevent access to information, and the librarian is putting their ideology before their professional work:

In this case, the librarian made a bad decision since he puts his ideology before his professional work. One cannot take away people's right to knowledge because just because you don't like what the book says. (Case 11)

As for the two interviewees who considered that the librarian acted well, one claimed that it was a book that at certain ages could affect the user and the other that such a book could scare users away:

I think the decision may be good because there may be people who, when in the library or consulting the catalog, might not return because they do not feel identified with the availability of a book on such a character. (Case 2)

Regarding the way in which the students would act, all of them affirmed that they would incorporate the document, alleging its historical interest and the possibility there might be users interested in it. One of the interviewees claimed that he would incorporate it but with access restrictions.

In the replies to both questions, the interviewees referred implicitly to the right to access information and the fight against censorship:

The librarian is nobody to censor any kind of literature. (Case 4)

Only one of the interviewees made explicit reference to an ethical issue:

In my opinion, the librarian does not act correctly when censoring the entry of that book. With his decision, he prioritizes his personal ethics, since according to his education, values, convictions, etc., he considers that it is not an adequate reading to be part of the fund. An action in this regard would be applying the professional ethics that as a professional I should have, in which any citizen must have access to information regardless of any personal ethics. Therefore, I would add this book to the public library collection, although I would never add it to my personal library. (Case 3)

In the first vignette of the second questionnaire (Table 2B), almost all the interviewees approved of the behavior of the librarians, highlighting in many cases their role as head of the acquisition policy. Only in one case was it considered that their action was incorrect, since the organization on which the library depends (the city council) is the one that determines the acquisition policy:

The one who sets the cultural policy of a city council is the corresponding councilorship, with the officials (librarians) at the service of the councilorship and its decisions and not the other way around. Correct action of the councilman and not of the librarians. (Case 10)

Regarding this vignette, explicit allusions to ethics also appeared on one occasion:

Even if your personal ethics are not in accordance with the acquisitions you buy or receive, you must include them because there must be points of view. (Case 8)

However, the arguments participants used were related not only to access to information and the fight against censorship but also to neutrality:

Table 3: Vignette 2 of the first and second questionnaires**(A) Questionnaire 1**

An Instagram user uploads a photo of her, taken by a prestigious photographer, in which she appears naked. Instagram removes it since it is not in compliance with its content publishing policies. Although the user does not mind appearing like this on the internet, Instagram insists on removing it.

(B) Questionnaire 2

A university library has a policy on the use of social networks in the institution. A worker writes a post on the library's Facebook account commenting on the clothing of the students who come to the library. Given the platform in which it has been published, it is disseminated to all the followers of that account.

that councilman is applying principles contrary to the plurality necessary in a society that aspires to achieve full democracy. (Case 9)

And legality:

In the case of the librarians, they were right to say that they did not agree, since these are materials that users are interested in and, they do not break the law for saying so. (Case 12)

Ethics in social networks, intellectual freedom, and loyalty to the institution

The following vignettes are framed in ethics in social networks and were related to the professional values of intellectual freedom and loyalty to the institution (Table 3).

In the first questionnaire (Table 3A), 11 of the 18 responses obtained valued positively the company's decision to eliminate the photograph of a user, five considered that it acted wrongly, and two did not answer. The most frequent argument considering positively the company's action was that the use of this service entails the acceptance of its policies:

Instagram's decision is correct since it is a company that sets its rules and if you use them, you have to adhere to them and not your personal decision. (Case 10)

However, the argument used to negatively assess the company's action was precisely to disagree with that policy:

Social networks, Instagram in this case, discriminate posts under general parameters. I think they should be more permissive and also take more into account the legislation of each country. Perhaps a nude in Republic X ... is a crime but not in Spain. In addition, there are numerous works of art from centuries ago on this theme and nobody sees them as pornography or in bad taste. (Case 4)

Whether or not to delete the photograph depended on the students' assessment of the company's action, but it stands out that in two cases the solution was to dialogue with the user:

I would have talked to the user to change the image. (Case 17)

The user should be asked if she has done it consciously, and if so, leave it posted (Case 14)

Or simply to use another social network allowing such images:

I think that the user should opt for another type of social network in which they have that policy. (Case 3)

Beyond respect or acceptance of the company's policies, there was no mention of ethical issues.

Of the 17 responses collected in the second questionnaire (Table 3B), to the second vignette 12 said that the worker had acted incorrectly, while on four occasions they said that the judgment on whether they had acted correctly or incorrectly depended on the content of the post. Finally, on one occasion, this judgment depended on the library's social media policy.

Regarding the interviewees who considered that the librarian had acted wrongly, two arguments that support this affirmation stand out. The first is the necessary distinction between the institutional and the personal account:

There has been a misuse of social networks. The worker should have written that post on his personal account and not on the company's since it is a subject that is not related to the basis of a library. (Case 5)

The second refers to the necessary neutrality and impartiality of the content of a library's social networks:

What he has done does not seem correct to me, a social profile of a public institution must be objective and in no case make opinions on certain topics such as users. (Case 14)

Regarding those who considered that the judgment on the librarian's action depends on the content of the message, especially if it was offensive or not, one student wrote,

I don't see anything wrong with what has been done. He has simply commented on a topic on a social network and people may or may not be against it, but nothing else. A different thing would have been writing something that could offend or attack someone. (Case 11)

Regarding how the interviewees would have acted, when they answered (only on seven occasions), they referred mainly to the need to consult the library's rules and the possibility of posting it on their personal social profiles:

I would not write down "personal opinions" on accounts of an institution, in any case, you can do it on your private account if you need to publish it on social networks. (Case 2)

Regarding the allusion to ethical issues, these referred in most cases, as noted above, to three issues: knowledge of and respect for the rules on the use of social networks in the work environment, the differentiation between institutional and private profiles, and the differentiation between offensive and inoffensive content.

Table 4: Vignette 3 of the first and second questionnaires**(A) Questionnaire 1**

A librarian from the cataloging service is planning her upcoming wedding. For this reason, at work, she has had to make some arrangements (restaurant, dressmaker, ...). As a consequence, telephone costs have increased and restrictions have been imposed. This way, all librarians have been left without a phone for external calls. A colleague disagrees with this measure since he considers it unfair and reports to the director of the service the abuse that his colleague has done, using the telephone for personal matters.

(B) Questionnaire 2

A librarian in the cataloging service adds records from the Rebiun catalog to her library's catalog. Rebiun uses the Library of Congress subject list, which is similar to the Ministry of Culture's list of subject headings used in its catalog. Therefore, and for the records to be more quickly accessible to users, she decides that the incorporation is done directly by keeping the subjects according to the list of the Library of Congress.

Professionalism and service quality

The third vignette of questionnaires 1 and 2 referred to two professional values: professionalism and quality of service (Table 4).

In the first questionnaire (Table 4A), the students rated three different things. First was the action of the librarian betraying the colleague for abusing the phone. On nine occasions they considered that he had acted well. The second issue they assessed was the performance of the librarian who abused the phone. In this case, six people rated this action negatively. Finally, three people valued positively the decision of the library to restrict the use of the phone:

The action of the library seems good to me. On the part of the complaining colleague, if he knew what he was doing, he should have notified him before instead of filing the complaint when the offense had already been committed. (Case 5)

Regarding the way to proceed, the students considered on seven occasions that they would report abuse by the librarian and on one occasion that they would not. Five interviewees provided different alternatives:

I think the company should have studied the reason for this situation and the colleagues have spoken privately and, in case of no reaction, raise the issue to management. (Case 17)

Only on one occasion did they allude explicitly to some type of ethical value, specifically the quality of public service:

The decision of the librarian who filed the complaint was correct since public means had been used for private benefit, which caused a subsequent restraint in the quality of that public service. (Case 10)

In the second questionnaire (Table 4B), ten of the interviewees said that from their point of view the librarian had not acted well, four that she had acted well, and in the rest of the cases the student had doubts. It should be noted that in this second questionnaire, reference

Table 5: Vignette 4 of the first and second questionnaires**(A) Questionnaire 1**

In the acquisitions department of a university library, the electronic contracting of a series of databases is being managed. Given the offers from different suppliers with very similar conditions, the one recommended by a family member of the director has been chosen since, out of friendship, it promises to get more simultaneous user access than what the contract will stipulate, at no additional cost.

(B) Questionnaire 2

A librarian has found software on the internet that makes it easier for him to catalog old collections. As the library does not facilitate his purchase, he manages to download a working copy that allows him to optimize the time he dedicates to cataloging this collection, being able to support his colleagues in carrying out other tasks, for example, user assistance.

was made up to four times to the need to adhere to the institution's standards, which could be interpreted as the value of professionalism or quality of service.

The librarian must use the list of the Ministry that is the one that uses its catalog. I would use the one imposed by the cataloging center and never a different one. (Case 4)

However, access to information was also considered an ethical value above any other option:

I do not know if any regulations prevent from doing what this librarian did, but if she did it to help users have faster access, I do not think that she acted wrong. Surely I would have done the same. (Case 11)

Interestingly, some of the students interpreted the vignette in terms of a value that, in principle, had not been considered when writing the vignette, that of copyright:

She does not act correctly, since they can be incorporated according to the principle of collaboration but always stating the source from which the data has been extracted, that is, citing the authorship. (Case 3)

Professionalism and copyright

The following vignettes referred to the values of professionalism and copyright (Table 5).

In the first questionnaire (Table 5A), 13 of the interviewees considered that the decision wrong, and four of them that the decision was right. The alleged reasons for determining that the decision was not correct were related to the fact that it did not guarantee quality of service, to the need to act within the law, and to the fact that all the conditions were reflected in the signed contract:

It does not seem correct to me, you should take that bid offering the best services within an assigned budget, and reflect it all in the contract. (Case 14)

On the other hand, considering that the decision had been right, the students gave more importance to the advantage achieved through the deal, within the law:

It seems a good alternative to me, and if it is to help, you can make use of several options, all without undermining the legality. (Case 15)

Or even that the company could be accused of corruption:

If an acquaintance can improve the service without additional expense, yes they would accept it and I see this action well. The blame would be on the company due to corruption. (Case 18)

When the students explained how they would have acted had they been in that situation, on only one occasion did they say that they would act in the same way, and on 11 occasions they said that they would not, sometimes providing other ways of deciding how to provide the service:

I would try to make a consortium with other libraries and buy these resources collectively. Prices, accesses, etc. could be better negotiated. If this is not possible, I would buy the most suitable base without the help of acquaintances or falling for recommendations of this type. (Case 4)

As noted above, this is the vignette in which there are the most allusions to acting within the legality and quality of the service or, at least, to good service. However, only on one occasion did an interview make an explicit allusion to ethical behavior:

In this case, the recruiting department does not act correctly, since they forget that it is a public service and as such, it must ensure that any contracted service must be real and therefore be perfectly reflected in the contract, surely there are other options a lot more ethical to improve the negotiation of the contract. I would have opted for a supplier whose service can be a demandable right in order to have legal tools in case of non-compliance. (Case 3)

In the second questionnaire (Table 5B), nine interviewees considered that the librarian had acted wrongly and five that he had acted well; three did not answer this question. The two main reasons for considering that the librarian had acted wrongly were that the responsibility to decide on the software used in the library belongs to the library itself and that the action of the librarian was illegal:

The librarian does not have to download anything. You must inform your superior of the shortcomings of the software you are using, and recommend that it be replaced by a more modern one. And let him and his team decide. (Case 4)

As for those who positively judged the librarian's action, they didn't have solid arguments:

It seems good to me. I would do the same. (Case 6)

I think it's correct. As long as the worker fulfills his functions and can also carry out others when he finishes, why not? (Case 5)

Regarding the answer to how they would have acted in their place, five said that they would have acted the same way, and six provided other options such as informing the

Table 6: Vignette 5 of the first and second questionnaires**(A) Questionnaire 1**

The documentalist of the documentation center of a food safety laboratory, as part of his job, has had access to reports on the contamination of cow meat with spongiform encephalopathy. For this reason, he knows that meat unfit for consumption is reaching the Spanish market. Due to the confidentiality clause that he has signed with his company, he avoids buying meat but does not take further measures, such as reporting the case to the appropriate authority or informing the media.

(B) Questionnaire 2

The documentalist of a company works on the standardization of a customer database. A university classmate has just started a document services company, but it is not doing very well, as he only has two or three clients. Because of this, the documentalist wants to help him, and for this, he provides five or six addresses of potential clients collected from the database that he is standardizing.

supervisor and negotiating or demanding the purchase of the software, given the advantages it provides:

The software used in the library works and with which the official works must have a user license, and be hosted within the programs of the site, therefore, even if he does it to save time, he should demand or request a similar software to streamline processes, instead of downloading it illegally. (Case 14)

In terms of ethical references, in 10 of the answers to the vignette from the second questionnaire, we can observe two aspects showing change: the fact that the students frame their decision in the context of the library's decisions, including turning to a superior as an option in the face of the dilemma that is presented to them; and choosing legality over the action of downloading software, even if it benefits the user:

At an operational level in its center, the action is advantageous but infringes the patent law. I believe that they should inform their superiors of the need and benefit of acquiring the software or license, to be able to use it in compliance with current regulations. (Case 3)

Privacy and confidentiality

Vignettes number 5 in both questionnaires referred to the professional value of privacy and confidentiality (Table 6).

To the vignette of the first questionnaire (Table 6A), 11 informants answered that the documentalist had acted wrongly, three that he had acted well, two doubted, and another two did not answer explicitly.

The responses that negatively judged the action of the documentalist put the health of the citizens above compliance with the confidentiality contract signed by the documentalist:

I believe that the social responsibility of the documentalist before a case of public health is greater than the confidentiality that the company requires. (Case 7)

This was contrary to those who claimed that the documentalist had acted correctly:

I believe that the documentalist is making strict use of professional confidentiality and that his conduct is appropriate. (Case 4)

Regarding what they would have done in their place, 15 students said they would report the case in breach of the confidentiality contract, even if this had consequences such as being dismissed; two would consult a lawyer or urge more inspections, and in one case they would opt to make the case public but using an alternative strategy:

As for what I would do, it is true that when you have a confidentiality contract, your hands are tied and you should not reveal what is kept under secrecy, but there might be a different way to make a health matter public in the interest of the public opinion. (Case 2)

For the vignette in the second questionnaire (Table 6B), 15 interviewees said that the documentalist had acted wrongly, one that he had acted well, and another did not answer this question. This vignette highlights the allusion, in almost all responses (12 cases), to ethical (confidentiality) and legal (data protection) issues, to support the negative assessment of the librarian's performance:

The data protection law prevents someone's personal information from being transferred to another company. According to professional ethics, this documentalist didn't act in the best way. (Case 1)

Regarding what they would have done, there are three answers where they consider it necessary to look for another alternative, such as helping to spread the word about the company by other means:

He should not do it, since these people are clients of a company, and I do not think that, under the law or the contract of the documentalist, he can provide access to the data of his clients. He could help with other things such as advertising on social media, but not disclosing personal data of the company's clients. (Case 12)

As for the ethical references, it seems that students have some knowledge of what professional secrecy means, but from a legal point of view rather than an ethical one. In any case, it is in these last vignettes that a change in attitude is most noticeable among the students, with these being the main topics to spark discussion in the training phase.

Discussion

The results of this work show how the attitude of the students who received training, even if it was minimal, showed a change from individual ethics toward what we could consider professional ethics. For this, a qualitative approach allowed the free expression of the students, without structuring the answers a priori, and therefore obtaining unforeseen and rich evaluations to identify their attitude before and after the training session.

From a methodological point of view, collecting data from vignettes could be considered a valuable option in addition to the methods traditionally used for research in ethics teaching. In this sense, the type of methodology traditionally used to observe the teaching and learning processes in ethics is case studies (Buchanan & Henderson, 2009; Froehlich, 1997; McMenemy, Poulter, & Burton, 2007; Pérez Pulido, 2018; Vallotton Preisig, Rösch,

& Stückerberger, 2014). However, over case studies, researchers have preferred questionnaires based on the description of scenarios and structured responses with Likert scales, or short-sentence pre-test and post-test designs that can subsequently be evaluated with statistical analysis. Although this type of approach might lead to generalization, and perhaps an extrapolation of results, it is necessary to take into account that, as mentioned, ethics present perspectives, content, and learning methodologies as diverse as the social groups to which they are aimed. For this reason, at the local level, to make decisions regarding the development of programs in specific settings, it could be considered not only useful but also necessary to adopt this qualitative perspective, to deepen the previous diagnosis required in any teaching or learning process.

From the point of view of the changes in attitude observed concerning ethical values, the results show how the students identified professional ethical values once they were taught, which sometimes helped them change their opinion in the way of thinking ethically at work, although at other times their individual ethics prevailed. This fact shows the importance of teaching ethics, not only from the perspective of a deontological theory but also from the perspective of the ethics of responsibility, understood as the opportunity to offer the student tools to be able to make decisions in freedom, taking into account the consequences of their actions, for which they assume responsibility. In this context, we can determine that the change in attitude observed from the training session has been possible thanks to providing the students with referents—which they initially did not have—to make decisions about an ethical conflict or dilemma. This is fundamentally evidenced in the first vignettes of the questionnaires, in which the students made a clear allusion to the values of intellectual freedom and the fight against censorship; and to the principle of neutrality present in all professional deontological codes, as stated in training sessions. Along these lines, in the last vignettes of the questionnaire, allusions to ethical and legal issues on conflicts related to confidentiality and professional secrecy were also the result of the training sessions, since in the initial situation, what prevailed was an opinion centered on the greater or lesser sensitivity of the student as a citizen, or on the knowledge, or lack thereof, of the law.

But, in general, what prevails in all the answers given by the students is the opinion based on individual ethics that has sometimes changed when receiving training on ethical thinking related to the professional field. Thus, vignettes number 2 of both questionnaires clearly show individual knowledge of the functioning of the institutional policies of social media that they later try to apply to the organizational sphere of the library. In this sense, an aspect to highlight is the claim that, although they know these policies, they do not agree with them, so it would be interesting to explore the decision-making model to detect what the ethical reasoning is and, specifically, the ethical theories in which they support their argument to make certain ethical decisions that can go beyond moral judgment (Cortina & Martínez, 2015). The same happens with vignettes number 3, where there is a great diversity of opinions due to the application of individual ethics to conflict resolution over professional ethical values such as professionalism or loyalty to the institution. However, in the second questionnaire, there's an allusion to specific ethical values such as access to information, or the quality of service in an organizational context, where the institution's

rules are considered a reference element for ethical action. Finally, the legal aspect together with the ethical shows clearly in the responses to vignettes number 4 of both questionnaires. Although in the first case individual ethics prevail, even exempting the professional from all responsibility and making it fall upon the company, in the second vignette, after the training session, a change is seen in the importance of acting following the law (to be ethical is to respect the law) and trust the institution's policies regarding technical processes and the relationship with suppliers.

Beyond the results obtained, studies such as those by [Jewels and Evans \(2005\)](#), [NehariTalet \(2011\)](#), and [Jafarkarimi, Saadatdoost, Sim, and Hee \(2016\)](#) support a difference in the ethical decision making of students due to cultural, educational, demographic, political, or individual and situational factors ([Rafinda, Arofah, Mustafa, & Ompusunggu, 2015](#)) that connect individual morals with ethical behavior. On the other hand, we have already mentioned the importance of including in the training process knowledge of ethical theories and an ethical reasoning model, to develop a true ethical judgment, since, as [Strittmatter and Bratton \(2014\)](#) demonstrate, students' judgment when making a certain ethical decision depends on the ethical theory used for it. In this way, just like [Martínez Martín et al. \(2002\)](#), other authors such as [Días-de-Figueiredo \(2009\)](#) and [Cortina and Martínez \(2015\)](#) advocate for an ethic of responsibility—based on [Kohlberg's \(1992\)](#) model, or [Habermas's \(2000\)](#) discursive ethics—which, together with deontological ethics, allows us to overcome the ethical conflicts and dilemmas posed by topics related to LIS, on the basis of in-depth debates as a teaching technique. In addition, the current context is causing a change in the nature of conflicts and ethical dilemmas, and although it does not affect the ethical principles and values already known in LIS, it does in specific professional situations related to the digital world, the environment, or the use of new technologies, which in the opinion of [Ferguson, Thornley, and Gibb \(2016\)](#) makes it necessary to review and update the professional codes of ethics so that they remain effective instruments when making ethical decisions.

In the opinion of [Cortina and Martínez \(2015\)](#), the role of ethics is to clarify what morals are, arguing and applying them to the social sphere. Applied ethics try to discover the principles and values of a profession or an organization, taking into account the different ethical traditions regarding the purpose of that profession or organization, society's values of civic morality, and universal critical morals. In the context of applied ethics, individual ethics converge in a joint way of proceeding by consensus. Hence, individual ethics built on solid, well-argued ethical foundations contribute to accepting as valid those moral judgments made by each individual in a specific situation. After the students had undergone a training session based on the argument that we have just explained, we found that their individual ethics had changed, through the training process, toward ethics more in line with the professional environment in which they're going to work, and this will contribute positively to the organization in which they work in the future.

To detect these changes in the attitude toward the ethical values of the students as a consequence of the training, it is first of all necessary to differentiate between morals and ethics, the former being understood as concrete action guidelines for a given case and the latter as a reflection on the different ethical theories and modes of argumentation to

correctly guide certain behavior. The change in attitude in the students then came from the ability to transform their individual ethics using arguments—that is to say, explaining the reasons to endorse or not endorse a certain moral action and thus reaching a certain ethical judgment in a professional environment through the deontological and responsibility theories learned in the training sessions. Still, we did not notice all the changes in attitude that would have been desirable. This can be attributed fundamentally to the short duration of the training sessions, which reaffirms both the university students' need for training and the fact that this is an element of the training and investigation process that needs to be corrected.

On the other hand, if doing ethics for Hare (1999) consists of dealing with practical moral questions to resolve what is right and wrong through arguments that lead us to make a decision accepting its consequences, the theory is relevant to practice; hence the importance of knowing ethical theories as instruments of moral philosophy that relate moral principles, argumentation, and the rules governing certain behavior for correct decision making. In any case, as Woodward (1989) has stated, ethics should not constitute a matter of opinion but should involve a very precise teaching methodology based on a theoretical and practical corpus. On top of this, another fundamental aspect on which all the above-mentioned theorists of ethics agree is the need to develop ethical critical thoughts as a new way of thinking through which, according to Hare, we can modify our intuitive thoughts.

Conclusion

We can consider that the content used for the training was correct, although the knowledge about the different ethical theories and ethical reasoning models for decision making should have been deepened. To the theoretical content we must add a teaching methodology based on the effective study of cases and scenarios in our work. On the other hand, the application of the vignettes technique and content analysis as a methodological approach to the students' discourse was very useful, since it was decisive in identifying the reasons that helped the students make a certain decision, before and after the training session, checking if this decision was made following their individual ethics or guided by normative ethics, and determining the degree of acceptance and depth of the training session.

Margarita Pérez-Pulido is a professor in the Department of Information and Communication at the University of Extremadura (Spain). Her lines of research are libraries management and planning and information ethics. Email: marperez@unex.es

Aurora González-Teruel is a professor in the Department of History of Science and Documentation at the University of Valencia (Spain). Her lines of research are the theoretical and methodological foundations for the study of the information user. Email: agonzal@uv.es

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