
AC 2012-3849: A CLASSROOM DISCUSSION OF APPLIED ETHICS

Yilmaz Hatipkarasulu, University of Texas, San Antonio

Yilmaz Hatipkarasulu holds M.S. and Ph.D. degrees in civil engineering from Louisiana State University. He is currently the Coordinator of the Construction Science and Management program at the University of Texas, San Antonio.

Dr. Suat Gunhan, University of Texas, San Antonio

Suat Gunhan received both his bachelor's of architecture and master's of science in architecture degrees from Dokuz Eylul University, and a Ph.D. degree in civil engineering from Illinois Institute of Technology. He is currently an Assistant Professor at the Construction Science and Management program at the University of Texas, San Antonio.

A Classroom Discussion of Applied Ethics

Abstract

Ethics, social responsibility, and trust are critical issues for all professions in the built environment including design, architecture, engineering and construction. Feedback from the industry representatives and practicing professionals often mention the increasing need for this subject. In the last two decades, professional degree programs in higher education placed a large emphasis on ethics education which is also an accreditation requirement for most programs. There are educational materials available for ethics education however, the discussions and study of these subjects are highly dependent on the instructor's approach and perspective. In most cases, the students are presented with basic information and asked to review case studies without actively simulating the decision making process. This paper presents an example for classroom discussion on how to consistently apply ethical principles. This example has been tested in the classroom at several levels and, based on this experience, possible student reactions and tips on how to direct the discussion are included in the paper. The purpose is to present a detailed resource for educators for presentation and active discussion using a simple example that students can easily relate to. The example is built on a very simple question of whether the student would accept a job offer from a company under certain conditions.

Introduction

Ethics, social responsibility, and trust are critical issues for all professions in the built environment including design, architecture, engineering and construction. Stakeholders of building construction projects recognize the importance of these issues through the creation of the codes of ethics and professional conduct. These codes are generally defined and enforced through licensing organizations, professional societies or within individual companies or firms. For the built environment professions, the American Institute of Architect's Code of Ethics and Professional Conduct¹, the National Society of Professional Engineers' Code of Ethics for Engineers², and the American Institute of Constructors' Code of Ethics provide comprehensive examples.

Feedback from the industry representatives and practicing professionals often mention the increasing need for ethics education. In the last two decades, professional degree programs in higher education placed a large emphasis on ethics education. Professional ethics and social responsibility subjects are also a part of the accreditation requirements for most programs. The Accreditation Board for Engineering and Technology⁴, the American Council for Construction Education⁵, and the National Architectural Accrediting Board⁶ require ethics to be included in considerable course content and/or integrated throughout the curriculum as one of the accreditation criteria.

There are educational materials available for ethics education which provide information at the fundamental level and focus on discipline specific issues. For example, design specific cases and discussion usually become the focal point in professional design curriculums⁷ while contractual and competitive relationships take the center stage in construction curriculums⁸. There are also comprehensive study materials and educational approaches which present a wider perspective

^{9,10,11}. However, the discussions and study of these subjects are highly dependent on the instructor's approach and perspective. In most cases, the students are presented with basic information and asked to review case studies. Although this approach is effective when there are multiple, well-developed and detailed cases, it does not actively simulate the decision making process.

This paper presents an example for classroom discussion on how to consistently apply ethical principles in the decision making process. This example has been tested in the classroom and, based on this experience, possible student reactions and tips on how to direct the discussion are included in the paper. Although the example provided in the paper focuses on a simple job offer scenario, different scenarios can be developed using the same framework and discussion structure.

Ethics, Applied Ethics and Educational Approach

Ethics can be defined as a science of morals, moral principles or code. Applied ethics is a person's systematic approach to determine and select values for individual conduct and application of these values in human interrelationships. These basic principles and selection of values are at the center of our personal lives and their reflections drive the relationships between parties in professional and business context.

In 2006, Hatipkarasulu and Gill proposed a systems approach for teaching ethics in the built environment disciplines. The approach includes four major points to provide the necessary body of knowledge and a system-wide perspective including ¹¹:

- 1. System Structure and Flow for the Built Environment:** Definition of the stakeholders and their relationships within the built environment system with a focus on interconnections, and ethical and contractual obligations.
- 2. Ethics, Applied Ethics, and Codes:** Definition of ethics, applied ethics and social responsibilities. Suggests using codes from different perspectives/professions to highlight similarities and differences.
- 3. Professional Responsibilities, Ethical Identification, and Relationships:** Discussion on needs and expectations of system elements. Suggests comparison of ethical and contractual view points and emphasizes the importance of trust and reputation in relationships.
- 4. Decision Making and Handling Conflicts:** Discussion on applied ethics in the decision making process. Suggests establishing a strong connection between principles and application and emphasizes the importance of consistency.

Hatipkarasulu and Gill also point out two important issues which are often difficult to avoid but rather important for the overall argument. First issue is differentiating between legality and ethics. There are examples of legal but unethical practices in the construction industry such as

bid shopping which is the practice of divulging solicited bids as leverage with contractors to lower their prices. The second issue is to avoid situational analyses. The argument is to make decisions based on the principles while avoiding conditional variations regardless of the circumstances and parties involved in the process. These two issues are perhaps the most challenging parts of ethical identification and decision making. It is very easy to overanalyze situations and end up with justifying or rationalizing the decisions even though they may violate the principle.

Our experience confirms the effectiveness of the approach suggested by Hatipkarasulu and Gill. The first three steps of their approach establish a strong foundation and provides a practical method to introduce the system structure, terminology, codes, and relationships, especially at first and second year courses. The classroom discussion example presented in this paper focuses on addressing the fourth step of the approach, the decision making process.

Establishing the tone and style of discussion is critical in conducting classroom exercises and encouraging active participation. Although style may differ significantly for each instructor, based on the authors' experience, two essential recommendations can be made for successful delivery, particularly for analysis and discussions. First recommendation is not to institute a strong lecturing attitude before and during the discussion. Presentation of ethical principles, professional code of ethics, and sample scenarios may provide proper preparation for the discussion, however, it is important to pay close attention to the tone of delivery. The second recommendation is to encourage exploration of ideas and maintain the continuity during the discussion. For the example presented in this paper, letting the students follow a particular line of thought, which may deviate from the ethical principles during the discussion, would increase the effectiveness of the final discussion and analysis.

The Decision Making Model

At the core of the classroom discussion, the students are challenged to make a personal decision and the decision making process is modeled using four major stages: the offer, the challenge, the dilemma, and the decision. This model can be adapted for different scenarios and can be extended for further discussions.

Using the model, the example in this paper is built on a very simple question of whether the student would accept a job offer from a company under certain conditions. This is a question that students can very easily relate to, especially closer to their graduation (junior and senior levels). It is also an individual question where they are obliged to make a personal decision while feeling comfortable enough to have a discussion with their peers as they are all in a similar situation.

Students are told that they have received a \$50,000 job offer from a reputable company and accepted (the offer). They received another job offer for \$55,000 two hours after they have accepted the first one (the challenge). Students are then asked whether they will accept the second offer (the dilemma) and make a decision (the decision). After a short discussion with their peers, the second offer is changed to a \$60,000 one. Several rounds of this decision making process are repeated with increasing amounts of money. The offer amounts can be adjusted

based on the local market conditions but it is important to keep the amounts close enough in the first few of rounds to create the opportunity for quick decisions.

The Classroom Discussion

In the last three years, we implemented the decision making model using different scenarios as stand-alone exercises, combined with formal ethics lectures, and part of case study analyses. The model performs very well in sophomore and junior courses when it is combined with formal lectures based on the Hatipkarasulu and Gill¹¹ approach. On the other hand, the following discussion structure, which includes the decisions making model with the job offer scenario, receives high attention in senior level courses because of its immediate relevance.

The discussion structure requires a series of questions from the instructor while students are asked to write their answers in a pop-quiz fashion. We have tried to collect the answers anonymously, without any names on the quiz, but the students usually take a more serious attitude when they have their names on the answer sheet. This structured exercise takes 35 to 50 minutes depending on the level of discussion between the questions and during the final analysis.

The discussion starts with preparation questions including the following fundamental definitions:

1. Define ethics.
2. Define applied ethics.
3. What is the difference between legality and ethics?
4. Can you think of an example that is legal but unethical?
5. Can you think of an example that is illegal but ethical?

The preparation questions serve as a warm-up discussion for the students with their peers and the instructor. The impact of the questions increases when the students are asked to write their answers before the discussion and reflect on their responses afterwards. The list of questions and examples can be expanded to include current events, industry trends, or personal experiences. However, it is very important to maintain a neutral tone without labeling the student responses as right or wrong. This round of questions establishes a foundation for the decision making process and the follow up discussions should include the importance of personal values and “principle to application” concepts while maintaining consistency. In our case, these questions also serve as a benchmark comparison to observe the student’s competency in the basic definitions and concepts. It is important to note here that the Construction Science and Management Program at the University of Texas at San Antonio (UTSA) include ethics content in five different construction courses and the students are usually comfortable in answering the preparation questions at junior and senior levels.

Some of preparation questions can be easily carried to a personal level to stimulate the discussion. For example, question 5 can be modified to read “Would you do something illegal when you know that it is the right thing to do?” However, it is essential to use the answers to create a personal reflection for the students without singling out and labeling a certain answer.

The preparation stage is followed by the introduction of the job offer scenario and the following set of questions:

6. Would you accept the second offer of \$55,000?
7. Would you accept the second offer of \$60,000?
8. Would you accept the second offer of \$75,000?
9. Would you accept the second offer of \$100,000?
10. How much money would it take you to accept a second offer?

When the second offer is not very different from the initial offer, it is very likely to have the majority of the students reject the second offer. The instructor should ask the reasons for the decision between the questions without showing signs of approval or disapproval. At this stage, it is expected to have students that will rationalize their decisions based on different reasons. “I have a family to take care of”, “I am a professional, I will go with the money”, or “I need to survive” are very typical responses to justify their answers. The number of offers and the money can be adjusted depending on the level of discussion among the students. Question 10 is designed to carry the discussion to a breaking point at which point the discussion moves into the analysis and closing stage.

We have also tried a similar job offer scenario in this structure where the students receive two offers with same amount of compensation; one from a “good” reputation company and the other from a “bad” one. For this scenario, it may be a good idea to utilize well-known local awards and recognitions and/or scandals from local news media to make the case more realistic. Using the second set of questions, the “bad” company increases the offer (the challenge and dilemma) and students are asked whether they would accept the higher offer. In this case, the question 10 is replaced with the following to carry the discussion to the breaking point: “You received an offer only from the “bad” company... Would you accept it?”

In the analysis and closing stage, the instructor asks the students to review their answers for the job offer challenge and discuss the changes in the thought process. The key for this stage is to review the answers from principle and consistency perspectives. The students that rejected the “lower” challenges but changed their decision for the “higher” ones should be asked about the reasons for the change. The students that choose the higher offer in the first challenge would likely to argue the same logic of “higher the better” throughout the process. The instructor should point out that the decisions process should remain the same regardless of the change in the offers. In other words, if the principle is not to break your word (or not to work for a “bad” company), the response to every single challenge should be negative. The student that choose the higher offer throughout the exercise should be complimented for his or her consistency while it may be appropriate to point out the potential dangers of damaging their professional reputation.

The closing of the discussion should include a reflection of the job offer exercise in professional practice. Current practices such as bid shopping¹² or reverse auctions^{13,14} can be easily utilized for this purpose while explaining the concept of ethical profit¹⁵. Professional responsibilities and reputation can also be included in the closing discussion, preferably, with some real-life examples and experiences.

Learning Outcomes and Assessment

The learning outcomes for this example can be defined to address the fundamental understanding of ethical principles as well as the consistent application of the principles. The UTSA Construction Science and Management Program uses multiple construction classes to address ethics where the fundamental definitions are covered in second year, sample cases studies and ethical identification concepts are discussed in the third year, and decision making and handling conflicts take the center stage in the fourth year. In our case, the job-offer scenario is executed in the fourth year as a stand-alone exercise.

The first five questions in the discussion provides an opportunity to assess the level of understanding for ethical principles. Since the students are asked to write their answers during the exercise, it is relatively simple to obtain a snapshot assessment. Because of the exposure in the second and third years, our experience shows that almost all of the students are comfortable in answering the first set of questions in their senior year. The second set of questions focuses on the application of the ethical principles and are more difficult to assess using the answer sheets. Since the students are encouraged to explore and decide independently in the second portion, written answers do not provide a solid measure. Although we have not conducted a structured assessment of the principle to application concept, students provide a positive feedback at the end of the discussion. The purpose of the exercise is to highlight the principle to application concept and the importance of consistency in the decision making process. This purpose is designed to be achieved after the discussion regardless of the written answers. It is very common to have students asking additional questions after the exercise, in a more confidential setting, that are related to a personal situation or a recent job offer that they have received.

Summary and Conclusions

Ethics, social responsibility, and trust are critical issues for the built environment professions. Today's fast pace business environment experience a wide range of social, cultural, economic, political pressures which makes ethical identification and behavior ever more important. Professional degree programs carry a large responsibility of shaping tomorrow's professionals and industry leaders through the higher education system. In the last two decades, these programs placed a large emphasis on ethics education and there are educational materials available to facilitate ethics discussions in the classroom. However, these classroom discussions are very dependent on the instructor's approach and often limited to fundamental definitions and specific case reviews.

This paper presents a structured 35 to 50 minute long classroom discussion on how to consistently apply ethical principles in the decision making process. The discussion includes a job offer scenario that the students can easily relate to. The discussion highlights the "principle to application" concept while providing a conversation for the fundamental definitions. Our experience have been very positive with this discussion especially with senior students. The idea behind the job offer scenario is to trigger critical thinking on a personal level while offering a comfortable discussion environment in the classroom as all students are in a similar situation. The decision making model and the structured discussion can easily be adapted to different scenarios and enhanced by using current events and personal experiences.

References

1. AIA (2007). 2007 Code of Ethics and Professional Conduct. American Institute of Architects, Washington, DC. Available at <http://www.aia.org/about/ethicsandbylaws/index.htm>
2. NSPE (2007). Code of Ethics for Engineers. National Society for Professional Engineers, Alexandria, VA. Available at <http://www.nspe.org/Ethics/CodeofEthics/index.html>
3. AIC (2005). Code of Ethics. American Institute of Constructors, Alexandria, VA. Available at http://www.aicnet.org/about/code_of_ethics.asp . Last accessed November 1, 2005.
4. ABET (2011). Criteria for Accrediting Engineering Programs – Program Outcomes and Assessment Accreditation Board for Engineering and Technology, Baltimore, MD.
5. ACCE (2010). Standards and Criteria for Baccalaureate and Associate Programs. American Council for Construction Education, San Antonio, TX.
6. NAAB (2011). National Architectural Accrediting Board Procedures for Accreditation. National Architectural Accrediting Board, Washington DC.
7. NSPE (2011). Ethics Resources. National Society for Professional Engineers, Alexandria, VA. Available at <http://www.nspe.org/Ethics/EthicsResources/index.html>
8. AIC (2001). A Program on Construction Ethics. American Institute of Constructors, Alexandria, VA.
9. NIEE (2003). Incident at Morales: An Engineering Ethics Story. National Institute for Engineering Ethics, Murdough Center for Engineering Professionalism, Texas Tech University, Lubbock, TX.
10. NIEE (2010). Henry’s Daughter. National Institute for Engineering Ethics, Murdough Center for Engineering Professionalism, Texas Tech University, Lubbock, TX.
11. Hatipkarasulu, Y. and Gill, J. H. (2006). Ethical Identification And Building Trust For The Built Environment: A Systems Approach. Proceedings of the 2006 American Society for Engineering Education Annual Conference & Exposition, Chicago, IL.
12. Doran, D. (2004). Survey of Construction Industry Ethical Practices. FMI Corporation, Raleigh, NC.
13. Hatipkarasulu, Y. and Gill, J. H. (2004). Identification of Shareholder Ethics and Responsibilities in Online Reverse Auctions for Construction Projects. Journal of Science and Engineering Ethics, Vol:10 Issue: 2: pp. 283- 288.
14. Horlen, J., Eldin, N., and Ajinkya, Y. (2005). Reverse Auctions: Controversial Bidding Practice. Journal of Professional Issues in Engineering Education and Practice, American Society of Civil Engineers, Vol. 131, No. 1, pp. 76-81
15. Moylan, W. (2005). Ethics in Construction Bidding: Considering the Friedman vs. the Freeman View. The Owners Perspective, Journal of the Construction Owner’s Association of America,. Spring 2005, pp.13-16, Atlanta, GA