

# Communicating bad news: from medical education to practice

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## Abstract

Providing comprehensive care to individuals is essential to medical practice. Communicating bad news is defined as any information that seriously and adversely affects a person's vision of the future. This study evaluates communication skills among medical students. The methodology consisted of simulation workshops on communicating bad news. The scene performed, the achievement of the primary (communication of bad news) and secondary (patient reception) objectives were evaluated using a structured questionnaire. Sixty students participated in the study, 96.7% achieved the primary objective and 78.3% did not achieve the secondary objective. In the presence of care and concern, the scores obtained were higher. The communication of bad news can be assessed by structured assessment and showing care and concern is positively associated with the quality of communication.

**Keywords:** Health communication. Patient simulation. Education, medical.

## Resumo

### Comunicação de más notícias: do ensino médico à prática

“Más notícias” são informações que, quando reveladas, afetam seriamente e de forma adversa a visão de uma pessoa sobre o próprio futuro. O objetivo deste estudo é avaliar a habilidade de comunicação dessas informações entre alunos de medicina. O método utilizado foi a simulação de situação em que os estudantes precisavam transmitir uma má notícia. Avaliou-se a cena interpretada por meio de questionário estruturado, considerando um objetivo primário (comunicar a notícia) e outro secundário (acolhimento do paciente). A amostra foi formada por 60 estudantes, dos quais 96,7% atingiram o objetivo primário e apenas 21,7% atingiram o objetivo secundário (total ou parcialmente). Os estudantes que demonstraram mais cuidado e preocupação com o paciente tiveram melhor desempenho. Conclui-se que a comunicação de más notícias pode ser avaliada com instrumento estruturado, e que a demonstração de cuidado e preocupação se correlaciona de maneira positiva com a qualidade da comunicação.

**Palavras-chave:** Comunicação em saúde. Simulação de paciente. Educação médica.

## Resumen

### Comunicación de malas noticias: de la educación médica a la práctica

El cuidado de las personas, en su conjunto, es esencial para la práctica médica. “Malas noticias” son informaciones que, cuando se revelan, afectan grave y negativamente la visión de una persona de su propio futuro. El objetivo de este estudio es evaluar la capacidad de comunicar esta información entre estudiantes de medicina. El método utilizado fue la simulación de una situación en la que los estudiantes necesitaban transmitir malas noticias. La escena interpretada se evaluó mediante un cuestionario estructurado, considerando un objetivo primario (comunicar la noticia) y otro secundario (acoger al paciente). La muestra estuvo formada por 60 estudiantes, de los cuales el 96,7% alcanzó el objetivo primario y solo el 21,7% alcanzó el objetivo secundario (total o parcialmente). Los estudiantes que mostraron más cuidado y preocupación por el paciente obtuvieron mejores resultados. Se concluye que la comunicación de malas noticias puede ser evaluada con un instrumento estructurado, y que la demostración de cuidado y preocupación se correlaciona positivamente con la calidad de la comunicación.

**Palabras clave:** Comunicación en salud. Simulación de paciente. Educación médica.

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In health care, “bad news” is any information that seriously and adversely affects an individual’s view of their future<sup>1-5</sup>. An example is the diagnosis of diseases, which changes the life of patients and of the people with whom they relate. These changes have both material and interpersonal impacts, as the disease signals the vulnerability and finitude inherent to human beings. Therefore, providing comprehensive care, with respect and closeness, is essential for the patient to accept their new situation and experience the disease in the best way possible<sup>1-6</sup>.

According to Torralba Roselló<sup>6</sup>, providing care is not a mere technique, but fundamentally an art, which involves knowledge from different fields (psychology, anatomy, anthropology, culture, religion). To perform this art and provide care with dignity, considering the patient’s autonomy, it is necessary to carry out a global reflection on the human being. Thus, a health professional’s skills must go beyond pure biological aspects and aim at understanding the patient as a whole<sup>6</sup>.

A necessary skill for care is communication. Communicating bad news can be a complex and challenging task, and the healthcare provider may feel uncomfortable or unable to carry it out. Thus, it is necessary to develop protocols and train professionals for this type of communication<sup>1-6</sup>.

A reference for communicating bad news, the Spikes protocol brings in its name a mnemonic acrostic that describes its six steps: SETTING UP the interview; assessing the patient’s PERCEPTION; obtaining the patient’s INVITATION; giving KNOWLEDGE and the information itself to the patient; addressing the patient’s EMOTIONS; STRATEGY and SUMMARY<sup>1-3</sup>.

There is still a lack of evidence and standard methodological approaches to teach communication skills for delivering bad news<sup>4-7</sup>. Simulation with actors has been used in several medical specialties<sup>5-8</sup>. The method is employed with students and actors in a simulated scenario, or in role play between students. Academic performance can be assessed using a structured questionnaire, and the students’ technique can be corrected through a collective or individual feedback debriefing.

Creative arts can assist medical education, considering anthropological aspects and the ethics of care<sup>6</sup>. Students participating in a study by Berney and collaborators<sup>9</sup> stated, almost

unanimously, that the learning experience with improvisational actors was positive. A study by Bell and collaborators<sup>10</sup> involved 200 health care professionals and students, who participated in a simulation of communication of bad news. Participants reported that the experience felt real (96%), that learning was significant (97%), and that training with actors was adequate and possibly better than in role-play format (80%).

Evidently, the training of health care professionals is essential for society<sup>4,7,8</sup>. However, training students seems to be more effective, with prior awareness-raising activities on how complex and challenging it can be to deliver bad news, so that future professionals do not have to face this situation without preparation<sup>5,11</sup>.

Given the need, from a bioethical perspective, for future health care professionals to improve this skill, the objective of this study is to evaluate, in a structured manner, the communication of bad news in a simulated environment by Brazilian medical students.

## Method

Through class representatives and advertisements on social media, we invited medical students from the Federal University of Paraná (UFPR), enrolled in any semester, to participate in the study. Exclusion criteria were being under 18 years of age, not declaring the wish to participate in the study (that is, not signing the consent form) and missing one of the two scheduled meetings. Activities took place in the Health Sciences Sector at UFPR, Curitiba/PR, in March 2019, on previously scheduled days. Participants were divided into groups according to course stage: basic cycle, clinical or internship.

The first workshop was aimed at internship stage students (from the 9<sup>th</sup> to the 12<sup>th</sup> semester), the second at clinical stage students (from the 5<sup>th</sup> to the 8<sup>th</sup> semester), and the third at basic stage students (from the 1<sup>st</sup> to the 4<sup>th</sup> semester). To ensure their effectiveness, workshops were limited to 30 participants each. On the scheduled day, the students had their questions about the research answered and received the informed consent form. Then, a questionnaire, which aimed to collect demographic and other data on

the participants' characteristics, was filled out individually.

On the scheduled day, the students participated individually in a simulation with an actor who played a patient. The scene was evaluated by an observer using a standard instrument. Upon entering the simulated medical office, each participant received the following instruction: *"Duration of simulation: 5 minutes. You will meet Mariana, 24 years old. She came to the UBS (primary health care unit) 20 days ago and asked for routine exams and a HIV test to another doctor. The exam result is inside the room, on the computer. Observe the result and report the news to the patient. Focus on communicating the news. This is not training on clinical practice."*

The result was HIV positive. The simulated patient, whose character was built based on the usual scenario found in medical practice, had a life story, typical personality and gave standard responses to the situation faced. The scene portrayed a particular moment in Mariana's life, in which she sought the doctor to receive information on the result of her exam. The primary ending of the scene was the communication of the bad news itself. However, a secondary ending was also prepared, which would happen if the physician showed, through verbal and non-verbal language, an understanding of and respect for the patient's psycho-emotional dimension. The scenes were prepared by a group of acting students trained by a professional actor in a 20-hour course, supervised by the researcher professor. The course focused on basic improvisational and acting techniques.

The scene was described to the participants just a minute before the simulation, so that there was no previous training for it. Participants also remained isolated to avoid communication with each other. The actors were instructed so that their performances were standardized in all simulations. The scene lasted a maximum of five minutes, and the students' performance was assessed using a standardized instrument, which was filled consensually by the observer and the actor. The observer witnessed the scene positioned behind the student as not to be seen or interfere with the scene. The standardized assessment instrument was developed by the researchers specifically for this study.

After the simulations, all participants were brought together for a collective debriefing session, which took place in a conversation circle format with the participation of researchers, actors and observers. The evaluation pointed out positive points and aspects to be improved in communicating bad news. At the end of the activities, participants gave their opinion on the workshop by filling an individual questionnaire.

The data were entered into an Excel spreadsheet and submitted to statistical analysis using the R software version 3.4.4. Sample size was defined by convenience, according to the interest of the participants. Demographic and performance data are described in frequencies and percentages. Performance was ranked in a scale of 0 to 1 for statistical analysis purposes and considered sufficient above 0.5. The corrected score was calculated using the formula  $score (0.1) = (score - minimum (score)) / (maximum (score) - minimum (score))$ . To correlate the achievement of the primary or secondary objective and performance, as well as the care and concern showed by the student and course stage, the Fisher's exact test was used; for the relationship between scores obtained and medical course stage, as well as care and concern showed by students and corrected scores, the Kruskal-Wallis test was used. The significance level was set at  $p < 0.05$  (5%).

## Results

The sample comprised 60 participants, of which 39 were women (65%) and 21 men (35%); 28 students were attending the basic cycle (46.7%), 26 the clinical stage (43.3%) and 6 (10%) the internship stage. Participants averaged 22.1 years of age, ranging from 18 to 29 years. Of the 60 participants, 27 (45%) knew how to adequately define the concept of difficult news, 30 (50%) had a partial knowledge of it, and 3 (5%) did not know. Regarding prior training, 50 participants (83.3%) had never received guidance on communicating bad news.

The instrument used to evaluate the participants' performance had 17 items, each with a score from 0 to 2: zero for item not fulfilled, one for partially fulfilled, and two for completely fulfilled. Therefore, adding the items' scores, the student's total score could range from 0 to 34 points. Table 1 shows the evaluation data.

**Table 1.** Student performance evaluation in a bad news simulation workshop

Items	No n (%)	Partially n (%)	Yes n (%)
Did the doctor introduced himself/herself?	25 (41.7)	1 (1.7)	34 (56.7)
Did the doctor treat you with respect?	3 (5)	7 (11.7)	50 (83.3)
Did the doctor show an interest in your ideas?	6 (10)	19 (31.7)	35 (58.3)
Did the doctor ask if you wanted to be accompanied by a family member?	48 (80)	1 (1.7)	11 (18.3)
Did the doctor understand your main concerns?	7 (11.7)	20 (33.3)	33 (55)
Did the doctor look at you and listen carefully?	4 (6.7)	28 (46.7)	28 (46.7)
Did the doctor let you speak without interruption?	10 (16.7)	22 (36.7)	28 (46.7)
Did the doctor give you as much information as you wanted?	4 (6.7)	14 (23.3)	42 (70)
Did the doctor speak in terms you could understand?	4 (6.7)	23 (38.3)	33 (55)
Did the doctor make sure you understood the information?	44 (73.3)	11 (18.3)	5 (8.3)
Did the doctor encourage you to ask questions?	25 (41.7)	11 (18.3)	24 (40)
Did the doctor involve you in the decisions?	46 (76.7)	9 (15)	5 (8.3)
Did the doctor discuss the next steps in the follow-up plan?	26 (43.4)	17 (28.3)	17 (28.3)
Did the doctor show care and concern?	11 (18.3)	31 (51.7)	18 (30)
Did you feel the doctor was secure of himself/herself?	16 (26.7)	24 (40)	20 (33.3)
Did the student achieve the primary objective?	0 (0)	2 (3.3)	58 (96.7)
Did the student achieve the secondary objective?	47 (78.3)	5 (8.3)	8 (13.3)

The participants' average total score was 19 points, with a median of 19 (standard deviation  $\pm$  6.1). The minimum score obtained was 7 and the maximum was 34. The primary objective of the simulation was for the student to deliver the bad news; 58 (96.7%) achieved it in full, and only 2 (3.3%) achieved it partially. The secondary objective was for the student to identify and address some important characteristic of the patient - which was clearly expressed by the actors. Only 8 (13.3%) of the participants achieved this objective, 5 (8.3%) partially achieved it, and most did not (47; 78.3%).

The care and concern for the patient in communicating bad news were fully shown by 18 participants (30%) and partially by 31 (51.6%). Eleven students (18.3%) did not show care and concern. Regarding the perceived contribution of

the simulation to improve the ability to deliver bad news, 54 participants (90%) said that the simulation contributed a lot, 4 (6.6%) that there was some contribution, 2 (3.3%) said it made no difference, and none of the participants indicated that the activity impaired learning.

In a simulation teaching environment, it is important to ensure that the simulated situation is a realistic reproduction of the student's reality. Of the participants, 42 (70%) declared that they felt immersed in reality during the scene, 16 (26.6%) had some feeling of reality, and 2 (3.3%) declared themselves indifferent. Regarding the feedback debriefing, 52 participants (86.6%) stated that the collective methodology contributed to learning, 6 (10%) stated that it partially contributed, and 2 (3.3%) declared themselves indifferent. No one marked the alternative that it impaired

learning. With respect to the participants' well-being in communicating bad news, 4 participants (6.6%) answered they felt "great," 23 (38.3%) "good," 27 (45%) "satisfactory or neutral," 6 (10%) "bad," and no participant answered "very bad."

A statistical analysis was carried out to standardize the total scores obtained by each participant in a scale of 0 to 1. Students were considered capable of breaking bad news when they obtained scores above 0.5. Analysis of the frequency with which the participants achieved the primary goal in association with the scores obtained (less than or greater than 0.5) showed no statistically significant difference between the participants with Fisher's exact test, with  $p=1.0$ . Among those who fully achieved the primary goal ( $n=58$ ), 36 (62%) scored below 0.5, and 22 (38%) scored more than 0.5. As for the two participants who achieved the primary objective only partially, one of them obtained a score greater than 0.5, and another scored below 0.5.

Regarding the relationship between achieving or not the secondary objective and the score obtained

(less than or greater than 0.5), the following results were obtained: 34 participants (56.7%) did not achieve the secondary objective and obtained an insufficient score ( $< 0.5$ ); 13 participants (21.7%) did not achieve the secondary goal, but obtained a score considered sufficient ( $>0.5$ ). One participant (1.7%) partially achieved the secondary objective and obtained an insufficient score; 4 participants (6.7%) partially achieved the secondary objective and obtained a score considered sufficient; 2 participants (3.3%) achieved the secondary objective in full, but did not obtain a sufficient score; 6 participants (10%) achieved the secondary objective and obtained a score considered sufficient; results were obtained using Fisher's exact test, with  $p=0.0034$ . Among the participants who did not achieve the secondary objective ( $n=47$ ), 34 (72.34%) did not obtain a score considered sufficient. Of the participants who achieved the secondary objective in full or partially ( $n=13$ ), 8 (61.54%) obtained a score considered sufficient. Among the participants who achieved the secondary objective in full ( $n=8$ ), 6 (75%) obtained a score considered sufficient (Table 2).

**Table 2.** Relationship between secondary objective and corrected score

Items	Score<0.5 n (%)*	Score>0.5 n (%)*
Did not achieve the secondary objective	34 (56.7)	13 (21.7)
Partially achieved the secondary objective	1 (1.7)	4 (6.7)
Achieved the secondary objective	2 (3.3)	6 (10)

\* Fisher's exact test:  $p=0.0034$

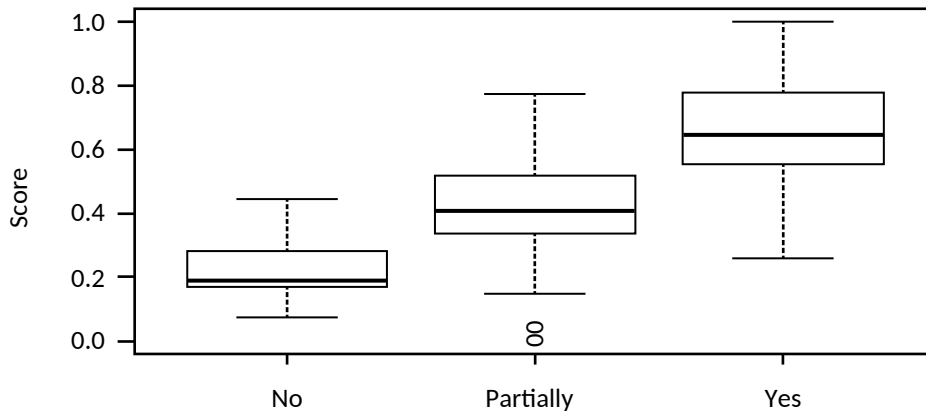
The study also examined the relationship between the score obtained and the medical course stage which the participant was attending at the time of the workshop, but no statistically significant difference between groups was found using the Kruskal-Wallis test, with  $p=0.16$

The question "Did the doctor show care and concern?" was analyzed in association with the course stage the students were attending and there was also no statistical difference ( $p=0.71$ ; Fisher's exact test). Among basic-cycle students, 6 (10%) did not show care and concern, 14 (23.3%) showed it partially, and 8 (13.3%) showed it in full. Within the group

of clinical-stage students, 3 (5%) did not show care and concern, 14 (23.3%) showed it partially, and 9 (15%) showed it in full. Finally, in the group of internship students, 2 (3.3%) did not show care and concern, 3 (5%) showed it partially, and 1 (1.7%) showed it in full. The above percentages refer to the total sample population.

When the same question ("Did the doctor show care and concern?") was analyzed in association with the corrected score, the data showed statistical significance. According to the results obtained, participants who obtained a higher score showed more care and concern for the patient (Graph 1).



**Graph 1.** Corrected score and question “Did the doctor show care and concern?”

Kruskal-Wallis test ( $p < 0.001$ )

## Discussion

Despite being a routine situation in medical practice, communicating bad news is a challenging task<sup>4,8</sup>. The lack of skill in this communication can cause suffering to the patient, family members and the professionals themselves<sup>5</sup>. For care to be humane and dignified, the health professional must recognize the patient as an individual, with their own conceptions about the health-disease process, and consider the vulnerability inherent to these situations. Therefore, future doctors must learn to communicate bad news, regardless of the specialty or area of expertise they choose.

Knowing the importance of promoting good practices in delivering bad news, this study addressed the teaching of communication skills in medical undergraduate courses. However, it would be unethical to subject patients to students in training just for learning purposes, since the bad news delivered would have a negative impact on everyone involved. Therefore, the study methodology included the participation of actors in the role of standardized patients. As Bell and collaborators<sup>10</sup> have shown, actors play an important role in training communication skills. The authors carried out simulation workshops with actors and the participants approved the experience. The experiment was considered challenging, as the actor did not follow a scripted scene, but improvised according to the situation, with a very realistic performance<sup>10</sup>.

As in other studies<sup>9-13</sup>, this study's sample consisted of both male and female young students, attending all stages of the medical course. It is important to note that the students' interest in participating in the workshop did not mean prior knowledge about the concept of bad news. More than half of the participants were unable to correctly define the concept – which suggests that, among students who were not interested in participating in the research, this number is probably even higher. Considering that these students will be health professionals, this result is a cause for concern.

Participants who were attending the basic cycle or the clinical stage showed more interest in participating in the study. This finding surprised the researchers, who assumed there would be greater interest among students closer to graduation, who would probably be more concerned with issues related to patient care. This study did not aim to evaluate the reasons for declining to participate, but some students who declined the invitation alleged an excess of activities. Encouraging these students was a challenge, although there was no lack of arguments: the teaching of communication skills to deliver bad news should be carried out throughout the medical course, from basic cycle to internship<sup>12</sup>.

A medical appointment is a moment of social interaction in which two or more individuals interact, each knowing who the interlocutor is and what the professional's role is. Thus, presenting names and functions of those involved is necessary.

However, 41.7% of the participants did not introduce themselves to the patient – a result that should serve as a warning to educators involved in teaching social and communicative skills at undergraduate courses.

Respect is essential in any relationship, as in its absence communication fails from the start. The doctor's respect for the patient and their interest in what the patient thinks were also assessed: 95% of the students showed respect, and 90% showed to be fully or partially interested in the patient's ideas. Therefore, students showed potential for empathic communication, provided they are trained for it. Humanization in health care depends on access to medical services and on valuing individuals. The doctor with a humanistic vision, in addition to having good medical skills, is also concerned with the patient's well-being and shows respect for human dignity<sup>13</sup>.

Communication is most effective when the interlocutor understands what the other wants to communicate. Unfortunately, it is common enough for healthcare professionals to use technical terms that may seem easy to understand for them but that to lay patients and family members are hard to comprehend. Most students in the study sample were able to communicate in a way that could be comprehended by the patient. However, few participants tried to make sure that the information was actually being understood. This result should be highlighted, since both the terms used and the failure to verify whether they were understood can impair communication<sup>1-3,7</sup>. It is important therefore to emphasize that future professionals, in addition to being aware of the medical vocabulary complexity, need to acquire the habit of questioning the interlocutor about their understanding of the information delivered.

Care involves engaging closely with the other, opening up to view this engagement as not just a mere contact between two people, but a situation in which "I" and "other" become "us." Receiving bad news reveals one's vulnerability, and that is why it is essential to show care and concern when delivering this type of news<sup>1-3</sup>. However, only a third of the participants showed this behavior. It would be important for medical teaching to focus, in addition to the profession's fundamental techniques, on the care and empathy necessary for medical practice. Care will never be perfect, as the

capacity of the caregiver – who also needs care – is finite, but it is essential, in order to respect human dignity, to understand illness as a moment of human vulnerability that entails a special need for attention and care<sup>6</sup>.

Most participants declared that the simulation felt realistic, which indicates that this study's approach is an adequate teaching method. If they did not feel immersed in a realistic situation, the participating students might have engaged in a purely technical task, incapable of bringing them closer to experience the stress involved in difficult scenarios. Most participants also declared that the simulation contributed to their learning about communicating bad news. However, the self-assessment carried out before and after the workshop did not correspond to this approval of the teaching method. This same finding was observed in other studies, as participants seem to become more aware of the weakness of their skills. Communication skills training is considered effective in improving this scenario<sup>7,11,14</sup>.

As important as the simulation is giving feedback to the students, which needs to be done in an understandable, welcoming way, pointing out positive points in the students' performance to encourage improvement. However, negative aspects must be corrected so that they are not perpetuated. This correction must be didactic, allowing the student to assimilate the knowledge without feeling exposed to the group to the point of giving up on learning<sup>15,16</sup>. Debriefing, the method used in this study, was very well accepted by the participants and contributed to learning. Collective debriefing was a choice motivated by the study characteristics, because individual feedback would be impractical due to time constraints. Individual evaluations could also intimidate some students, increasing anxiety and preventing the exchange of knowledge that the conversation circle allows.

Berney and collaborators<sup>9</sup> recommend an individualized feedback strategy<sup>9</sup>. Kim and collaborators<sup>15</sup> point out that a collective debriefing approach should involve surveying the characteristics of the group, introducing new concepts and a final reflection based on the assimilated content. A comparison of both strategies indicates that group learning is more effective than an individual approach, considering that the difficulty of one participant might also be

the difficulty of the whole group. As observed in this study, which brought together participants, actors and tutors, the group provides mutual support.

The evaluation instrument used in the study had two defined objectives. The primary objective was to deliver the bad news, regardless of the quality of the communication. As expected, this objective was achieved by almost all participants. The secondary objective, however, had different results. To achieve it, participants needed to perceive the patient's subjectivity. The actor was prepared to show important characteristics of the character played through non-verbal and verbal language. If the student showed a perception of these characteristics through questions or comments, the secondary objective would be considered achieved.

The importance of empathy for the future health professional is evident. However, the secondary objective was achieved, in full or partially, by only 21.6% of the sample. This shows that most students have the ability to break bad news, but cannot recognize the patient as a person who is much more than a mere recipient of information. To reverse this result, it is necessary to develop the students' empathy through practice-based training with patients and reflective discussion about their own attitudes<sup>17</sup>.

The evaluation of the student's performance in the simulation was made by summing the scores for the various items considered important for the ability to break bad news. After a statistical analysis, the total score for each participant was ranked in an interval from 0 to 1. Scores above 0.5 were considered satisfactory. The aim of the statistical analysis was to associate the score obtained by each participant with several items considered relevant: medical course stage, having achieved or not the primary objective, having achieved or not the secondary objective, and the care and concern for the patient shown by the participant.

Teaching the ability to communicate bad news, through lectures, dramatization or using the Spikes protocol, makes students more prepared and confident. Addressing the topic during undergraduate medical studies is effective in improving this skill<sup>18</sup>. However, this could not be corroborated in this study. Being closer to graduating did not mean having better communication skills.

This result suggests that the topic may not have been addressed during the course, since, when the workshop was held, subjects such as palliative care, oncology and geriatrics were not part of the mandatory curriculum nor were they offered as optional classes. Thus, access to this type of knowledge would only be possible if teachers from other disciplines considered communicating bad news relevant to the student's medical education. This shows that communication skills should receive more attention.

Students who obtained higher scores showed more care and concern for the patient in the simulated environment. We can affirm, therefore, that when students observe closely the patient, their performance improves. Given this association, care and concern can be considered quality markers in communicating bad news.

Communication is inherent to human beings. Therefore, it was already expected that there would be no correlation between achieving the primary objective (simply communicating the news) and obtaining a higher or lower score. The simple act of delivering news is not related to good or bad performance in the evaluation model adopted. On the other hand, the perception of the other as a whole (secondary objective) was not an ability that proved to be inherent to the students. This skill, however, is essential for health professionals, who need to acquire verbal and non-verbal resources to establish good relationships and act appropriately. Thus, unlike the primary objective, achieving the secondary objective was clearly associated with higher scores.

This study, like any other, also has limitations. There is no standard instrument described in the literature to assess the quality of communication, which depends on numerous factors that are not always measurable. The structured assessment instrument used in this study can therefore still be improved. A sample with a larger number of participants and proportional to student distribution among academic stages could also produce new results. Subjectivity is inherent to this type of study, which involves personal interactions and theatrical techniques. To minimize biases, the actors rehearsed extensively using mirror techniques, to standardize their performance, and a structured assessment instrument was used.



## Final considerations

We conclude that the communication of bad news in a simulated environment can be evaluated using a structured instrument. Showing care and concern was positively associated with quality of communication, but it was not associated with students attending a more advanced stage in the medical course. The perception of the


patient's subjectivity, signaled in this study by the achievement of the secondary objective, showed to be directly related to a better performance of the participant. The ability to communicate bad news can be taught and trained during the medical course, as well as corrected through debriefing. This skill is part of the daily practice of the medical professional, who has the obligation to communicate the truth in an ethical manner, respecting the principle of beneficence.

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#### Participation of the authors

Ana Paula Rosa Isquierdo participated in all stages of the study. Evandro Santos Bilek participated in data collection, literature review, writing of the manuscript and as research advisor. Úrsula Bueno do Prado Guirro participated by submitting the study to the ethics committee, collecting data, reviewing the literature and writing the manuscript.

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