An interactive simulation program was developed for use in teaching students how to handle public relations problems. The program user is placed in the role of assistant newsletter editor, facing a series of decision-making situations. Each choice the user makes affects the subsequent reality created by the program, which is designed to provide (1) a high degree of movement for the student user, (2) first-hand experience with high technology, and (3) a novel way of learning and applying course material in a realistic manner. The "Simulator" program was tested with two groups of students at the Pennsylvania State University in 1985. Students who used the program then completed a survey to help evaluate the effectiveness of the program. Results indicated that student users found the program interesting and educational. Although there are limitations to this type of computer assisted learning, it has the potential of making great contributions to public relations education. (DF)
Simulator: A Pilot Interactive Simulation Program for use in Teaching Public Relations

by

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TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."
Simulator: A Pilot Interactive Simulation Program for use in Teaching Public Relations

Abstract

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Computer-assisted instruction is becoming an increasingly vital part of public relations education. In this paper, the author describes a newly developed interactive simulation program for use in teaching public relations problems. The program, which focuses on employee communications, is analyzed in terms of its ability to achieve stated instructional goals and student evaluations of its effectiveness.
Simulator: Pilot Interactive Simulation Program for use in Teaching Public Relations

Introduction

Imagine yourself an account executive in a medium-sized public relations agency in Minneapolis, Minnesota. One of your accounts is with the Lutheran Brotherhood of Minnesota, which is sponsoring a visit by the prime minister of Norway to the Twin Cities.

Your primary responsibility for the visit has been to plan a special dinner for the prime minister. You've made all the necessary arrangements, including a guest list that includes the governor of Minnesota, the mayor of Minneapolis, and former Vice President Walter Mondale.

Finally, it is the evening of the dinner and everything appears to go without a hitch. The governor, the mayor, the vice president, and the prime minister all have arrived. Secret Service agents have taken care of security, and the caterers are beginning to serve the salad and wine.

Glancing out the door, you notice a commotion. You decide to take a closer look. You discover a group of angry citizens protesting the Norwegian prime minister's visit. The protesters are opposed to Norway's liberal whaling regulations, which allow Norwegian fishermen to hunt virtually all whale species. You also notice a television camera crew setting up for a live transmission.

What is your reaction to this crisis?
This is a hypothetical case. It is based on a public relations problem that actually occurred. It is also the type of scenario that could be adapted to an interactive program on a personal computer.

The author has developed and tested a similar pilot program for use in a public relations problems course at The Pennsylvania State University. The program provides a case study in employee communications. This paper outlines the experimental program and its reception among student users.

Background

Programmed learning has been a part of journalism education for some two decades. Some of the earliest pioneers include Robert L. Bishop, Wayne Danielson and Jerome Nelson, who in the 1960s developed programmed instruction texts for journalism education (Oates, 1982).

In the 1970s, these and other scholars began adapting their ideas to computer-assisted formats. Marzolf (1971) wrote about a computer program that checked reporting papers. At the 1972 annual convention of the Association for Education in Journalism (AEJ), Bishop demonstrated his computerized system for analyzing news stories.

During the past decade, a number of new computer applications have emerged. For example, Counts and Oates (1975)
utilized PLATO for journalism graphics instruction. Tinker (1977) and Lancaster, Leckenby and Stern (1983) have developed interactive computer programs as an aide in teaching advertising media planning. Ward and Hansen (1984) demonstrated on-line computer games for teaching information strategies. Personal computer applications in public relations education have been outlined by a number of scholars, including Nager (1984), Taliaferro (1984), Solberg (1984), and Rayfield (1984).

Perhaps some of the most exciting work to date has been that involving computer simulation. Harper (1980), for example, presented a computer simulation of the newspaper firm. Block and Schultz (1976) developed a computer simulation media buying game. Danielson (1982) has developed a number of programs that simulate an interview with a news source. Programs such as these are particularly useful in that they allow the student to learn in a realistic, individualized setting.

Public Relations Simulation Program

The experimental program discussed in this paper is built upon these previous interactive simulation programs. In the program, the user is placed in the role of an assistant newsletter editor, facing a series of decision-making situations. Each choice that is made affects the subsequent "reality" that the program creates. There are, however, no sure things.
Instead, each choice is associated with a set of probable outcomes. Thus, the user may make the "best" choice without necessarily obtaining the desired outcome. Similarly, the user may go through the program twice, make the same decisions, yet wind up with different outcomes each time.

It should be noted that while the author determined the probability that any particular outcome would occur, he could not guarantee what would happen on any single use.

The program is designed to accomplish at least three goals. First, as an interactive program, it is designed to be highly involving for the student user. Unlike reading a book or listening to a lecture, "talking" to a computer and having it reply can be an engaging process. This heightened involvement, it is hoped, will increase both comprehension of and interest in the subject matter at hand.

Second, since most students in public relations have had little prior exposure to computers, especially personal computers, use of the program gives them first-hand experience with "high technology." Many students are fearful of computers, and introducing them to a "friendly" computer can help quell those fears.

Finally, using an interactive microcomputer program provides a novel way of learning and applying course material in a "realistic" fashion. It is one thing to discuss public relations problems in the classroom, and it is quite another to respond to them on an individualized basis with a computer. The process can be both entertaining and challenging.
"Simulator," as the program is called, is tailored to meet each of these goals. For example, to increase the level of user involvement, the computer begins by asking the user's name. Subsequently, the computer addresses the user by his/her name.

The interactive nature of the program makes the student's introduction to "high technology" an easy one. Furthermore, a number of error-detection features have been built into the program to facilitate the process even more. For instance, if the user types an invalid response, the computer indicates the nature of the mistake and allows it to be corrected before continuing.

Simulator is also designed to meet the third goal in a number of ways. First, the program is written to reflect and sometimes introduce important public relations concepts. For example, the experimental program discussed here outlines three types of newsletter content identified in research by Grunig (1977) and Pavlik, Nwosu and Ettel-Gonzalez (1982).

Second, the outcomes associated with each decision in the case are probabilities, not certainties. In this manner, Simulator reflects reality. It also allows the user to proceed through the program on multiple occasions obtaining a new experience each time.

Finally, certain features have been built in purely for entertainment. For instance, on those occasions when the user receives a promotion for performing an outstanding job, the computer gives both verbal congratulations as well as plays the theme from "Rocky."
Test of Program

The Simulator program, which deals with employee communications, was tested with two groups of students at Penn State. It was first tested using students in a public relations problems class, spring semester, 1985. Prior to using the program, students read a number of articles and participated in in-class discussions about employee relations. Similarly, they were informed of the increasing use of personal computers in public relations, and were given a set of printed instructions on using the personal computer laboratory at Penn State.

During the following summer, students in a media and society course were also given the opportunity to use and evaluate the program. These students were similarly introduced to the program through class discussion and readings. However, they ran the program on a personal computer in the author's office in order to avoid the technical problems experienced by the previous group (see following discussion). The results from the two tests have been combined since they were virtually identical.

A survey was taken to help evaluate the effectiveness of the program. The results of this survey are presented in table 1. As can be seen, the response was generally quite positive. First of all, on a scale of 1 to 5, every student found the program to be at least somewhat interesting. In fact, only a single user
rated the program less than a 3 on this 5-point scale (mean=4.0; 5 is very interesting, 1 is not at all).

Similarly, most students (74 percent) found the decision situations in the program to be at least moderately challenging, with only one saying the program was not challenging at all (mean=3.1). The program was also rated as fairly realistic by the majority of users (91 percent; mean 3.7). About three-fourths (76 percent) said that Simulator was moderately to very educational. Almost all (91 percent) indicated that the program was quite easy to use, although about a third (31 percent) were hampered by technical difficulties. (Note: Those in the public relations section used the program in a university personal computer network that had only recently been opened for student use and still had a number of "bugs." Virtually all of those who experienced technical difficulties were in this section.) Using the program was also a novel experience for most, as nearly three-fourths (71 percent) had little or no prior experience with microcomputers.

Perhaps most encouraging was the positive response to the following item: How interested are you in using the microcomputer to explore more public relations case problems? Over half (56 percent) said they were very interested, and only one said s/he had no interest (mean of 4.3).

The students' open-ended comments were also encouraging. Nearly half (46 percent) said the program was an entertaining way to learn. As one student said, "It was very interesting and educating--I have never used a computer like this before. It was
a fun and easy introduction to computer use." About a fifth (20 percent) said they particularly enjoyed being given the opportunity to make practical decisions. For example, one student wrote, "It allowed us to practice public relations in a real-life situation and decide what we would do under different circumstances." Almost every negative comment pertained to the technical difficulties experienced in the laboratory. In fact, only three comments dealt directly with the program; two said the program was too short (it takes five-10 minutes) and the other said the outcome was not realistic (s/he failed to get promoted!).

For those in the public relations problems class, the program was also analyzed in terms of the students' choices in the various situations and their resulting outcomes. The purpose of this analysis was to assess whether the "correct" choice was apparent to the students, or whether the available choices presented equally viable alternatives.

The program begins by placing the student in an entry-level public relations job with Bugle Insurance Company. S/he is given the assignment of improving the employee newsletter, which has been suffering from sagging readership. S/he decides to begin a new monthly column featuring an interview with a randomly selected employee from among the rank and file. The interview proceeds in a rather mundane fashion, and the user is given a choice of which question to ask next. Examining data from each student's first run through the program, we see a fairly even split among the four choices: six said they would ask the
interviewee if she had ever been sexually harassed at Bugle Insurance; eight said they would ask if she had ever been the victim of sex discrimination; seven said they would ask her how she liked working in the "ratings and changes" unit at Bugle Insurance; and one said s/he would ask her how long she had worked at Bugle Insurance. Overall, this suggests that there is no obviously "correct" choice.

Finally, of the 17 students who tried out the program, five received promotions for jobs well done, none were fired or quit, and 12 got their first taste of public relations without any fanfare.

Conclusions

A new simulation program has been developed for use in public relations education. Although it is in only the experimental stages, this interactive program has met with moderate success. Student users have found it interesting, educational, challenging--and, perhaps most importantly, they want more.

Although there are many limitations to this type of computer-assisted learning, its potential contribution to public relations education is even greater. Simulator presents only one case scenario--employee communications at Bugle Insurance. The range of available alternatives for additional scenarios is
virtually unlimited--community relations, financial relations, crisis communications, media relations. The list goes on and on.

Work in this area presents a promising challenge educators. It is an opportunity to combine the educator's analytical and creative skills in developing future simulation programs. As Ward and Hansen (1984) note, writing computer scenarios is similar to playwriting. "The designers of the exercise have control over all the possible plot developments and character choices of action." Through this new medium, the educator has a versatile teaching tool able to motivate the student, heighten his/her interest in the subject or task at hand, and simulate a professional communications situation.
References


IBM BASIC by Microsoft Corp. (1982).


Tinker, S.F. (1977), "Analytical Concepts in Media Planning: A PLATO Interactive Study Unit," presented at the Annual Convention of the Association for Education in Journalism, Madison, WI.


NOTE: Simulator is written in Advanced Basic for an IBM pc. For a copy of the program, please write or call William R. Oates, Director, The Oates Clearinghouse, PO Box 248127, University of Miami, Coral Gables, FL 33124 (305) 284-2265.

This paper is forthcoming (in press) in Public Relations Research and Education.
Table 1

Student Evaluations of Simulator Program

<table>
<thead>
<tr>
<th>Students said SIMULATOR was:</th>
<th>Not at All</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>Very</th>
<th>( \bar{x} )</th>
</tr>
</thead>
<tbody>
<tr>
<td>Interesting</td>
<td>0 (0%)</td>
<td>1 (2%)</td>
<td>9 (20%)</td>
<td>22 (49%)</td>
<td>13</td>
<td>( \bar{x} = 4.0 )</td>
</tr>
<tr>
<td>Challenging</td>
<td>1 (2%)</td>
<td>11 (24.4%)</td>
<td>17 (38%)</td>
<td>14 (31%)</td>
<td>2</td>
<td>( \bar{x} = 3.1 )</td>
</tr>
<tr>
<td>Realistic</td>
<td>1 (2%)</td>
<td>3 (7%)</td>
<td>11 (24%)</td>
<td>22 (49%)</td>
<td>8</td>
<td>( \bar{x} = 3.4 )</td>
</tr>
<tr>
<td>Educational</td>
<td>1 (2%)</td>
<td>10 (22%)</td>
<td>20 (44%)</td>
<td>10 (22%)</td>
<td>4</td>
<td>( \bar{x} = 3.1 )</td>
</tr>
<tr>
<td>Easy to Use</td>
<td>2 (4%)</td>
<td>0 (0%)</td>
<td>2 (4%)</td>
<td>10 (22%)</td>
<td>31</td>
<td>( \bar{x} = 4.5 )</td>
</tr>
<tr>
<td>Interested in More Programs</td>
<td>1 (2%)</td>
<td>2 (4%)</td>
<td>4 (9%)</td>
<td>13 (29%)</td>
<td>25</td>
<td>( \bar{x} = 4.3 )</td>
</tr>
<tr>
<td>Hampered by Technical</td>
<td>31 (69%)</td>
<td>1 (2%)</td>
<td>4 (9%)</td>
<td>5 (11%)</td>
<td>4</td>
<td>( \bar{x} = 1.8 )</td>
</tr>
<tr>
<td>Difficulties</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Experienced with Microcomputers</td>
<td>17 (38%)</td>
<td>15 (33%)</td>
<td>9 (20%)</td>
<td>3 (6%)</td>
<td>1</td>
<td>( \bar{x} = 2.0 )</td>
</tr>
</tbody>
</table>

N=45

*Note: Some percentages do not sum to 100% because of rounding.*