1981

The Communicator's Physical Attractiveness and Credibility as Determinants of the Effectiveness of a Speech.

Joyce Kocian Covington
Louisiana State University and Agricultural & Mechanical College

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THE COMMUNICATOR'S PHYSICAL ATTRACTIVENESS AND CREDIBILITY AS DETERMINANTS OF THE EFFECTIVENESS OF A SPEECH

The Louisiana State University and Agricultural and Mechanical Col. PH.D. 1981

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THE COMMUNICATOR'S PHYSICAL ATTRACTIVENESS AND CREDIBILITY AS DETERMINANTS OF THE EFFECTIVENESS OF A SPEECH

A Dissertation

Submitted to the Graduate Faculty of the Louisiana State University and Agricultural and Mechanical College in partial fulfillment of the requirements for the degree of Doctor of Philosophy

in

The Department of Speech

by

Joyce Kocian Covington
B.S., Texas A & I University, 1973
M.A., Northeast Louisiana University, 1976
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ABSTRACT

The purpose of the study is to determine the extent to which a speaker's physical attractiveness and credibility may influence the effectiveness of a speech. The following questions were asked:

a. Is the speaker effectiveness determined by the speaker's physical attractiveness and credibility?

b. Will the attractive speaker be perceived as a less effective speaker, other things being equal?

c. Additionally, will the study show which the audience thinks is of greater influence in evaluating the effectiveness of a speaker, physical attractiveness or credibility?

A significant F value was hypothesized for the main effects physical attractiveness, sex, and introduction. An introduction effect was also predicted. The confederate speaker served as both the attractive and the not-so-attractive speaker. A no, low, or high credible introduction prefaced each of the attractiveness conditions. A total of six combinations of introduction and attractiveness were used in this experiment. The subjects, all beginning speech class members, viewed a four minute video taped speech. Following the speech each subject filled out an ethos semantic differential and a semantic differential for effectiveness.

The resulting ANOVAs revealed that neither credibility nor effectiveness were significant for the main effect attractiveness. The main effect sex was not significant for credibility or
effectiveness. For the main effect introduction, the $F$ value was significant on all three levels of the credibility measure and for the effectiveness measure.

It was further revealed that the male subject, when viewing an attractive female speaker, always rated the female highest in the low introduction condition. The female, when viewing the attractive female speaker, rated the high introduction conditions most effective. In the unattractive condition the male did not rate the speaker in any set pattern. The female subject, on the other hand, rated the low credible introduction the highest in the unattractive condition.

The overall effective rating was as follows: 1) attractive/low introduction, 2) unattractive/low introduction, 3) attractive/high introduction, 4) unattractive/high introduction, 5) attractive/no introduction, and 6) unattractive/no introduction.

Therefore, it can be concluded based on these findings that:

a. The speaker's effectiveness is not determined by the speaker's physical attractiveness. Perceived credibility does determine the speaker's effectiveness.

b. Perceived speaker effectiveness is not determined by attractiveness of the speaker, other things being equal.

c. Finally, credibility, as measured by three levels of introduction, is of greater influence in evaluating the effectiveness of a speaker, than is physical attractiveness.
I. INTRODUCTION

Importance of the Study

It is not possible to read a magazine, watch television, enter a clothes or hair boutique without being bombarded with information on how to be a "more beautiful you". A current television advertisement for bath soap suggests a cleanser to aid in attaining the beauty of a Greek goddess. A pantyhose commercial suggests use of their product for a complete beauty look. Several times each day the public is confronted with information to improve its physical attractiveness.

The standards of physical attractiveness vary from culture to culture and from one time period to another. Nevertheless, within any one culture at any given time there is fairly good agreement as to just who should be classified as beautiful women and handsome men. Our culture places great value on this superficial attribution. The advertising industry spends much time and effort trying to convince us that we can attract and hold onto a potential mate only if we are very appealing physically. The message is that if we spend vast amounts of money on products that give us suitably attractive hair, complexion, teeth, skin color, posture, weight, bustline, odor, and whatever, we will each become a much sought-after sex object. Considering the profits that result from this continual hard-sell, the advertisers have probably succeeded in convincing us very well. It would be difficult to argue that it is reasonable or fair to judge other people on the basis of looks. Nevertheless, that appears to be exactly what many people do. (Baron & Byrne, 1978, pp. 212-213).
One is encouraged to dress for the occasion and to dress for dinner. Children are directed to nursery rhymes that describe how a girl is transformed into a beautiful princess by a fairy godmother. Beauty is indeed important in our world of work, play, and success. We have beauty pageants, beauty queens, and beauty finalists for every celebration imaginable.

But one does not focus attention on physical attributes for the sake of physical attraction alone. Suggestions are given for physical attractiveness in the job market. This theme is evidenced in areas such as interviewing where it is suggested that one dress his best and groom himself to get an advantage over other applicants.

Frequent mention is made of an attractive person while the unattractive individual is seldom singled out. Although people are quick to reply "beauty is only skin deep" and "there is more to a person than meets the eye", much attention is paid to the attractiveness or unattractiveness of a person. Physical attractiveness can and often is a variable that will influence the listener's opinion of the speaker and vice versa. Baron and Byrne (1978, p. 212) support this thought:

Each of us seems to have acquired a set of very strong preferences with respect to the way our fellow being should look. We respond with positive and negative feelings on the basis of facial features, weight, height, hair color, and length and numerous other aspects of the anatomy from bow legs to mustaches.

The attention to physical attractiveness is not limited to J. Q. Public. The field of communication focuses attention on
physical attributes and the role of physical attractiveness in delivery. Many current basic speech books include a discussion of the variable of physical attractiveness. In the book SPEECH: A Text With Adopted Readings, Jeffrey and Peterson (1975, p. 337) suggest,

A speaker's appearance undoubtedly contributes to his effectiveness. While a speaker can do little to alter the features with which he has been endowed by nature, he can at least present himself in the best possible light. Simply stated, the speaker should be groomed and dressed in a manner that is suitable to the audience and occasion.

Baird and Knower (1957, pp. 191-192) re-emphasize the importance of physical attractiveness in the statement:

Most of us have learned from experience that first impressions are often misleading; but we also know that in speaking they are important in orienting the audience to what follows. . . . [The speaker's] position, movements, appearance and manner . . . create their communicative effects quite apart from linguistic or vocal symbols. . . . [These] visual symbols are often used as a substitute for oral or written language.

Speakers who realize the importance of physical attractiveness go to various lengths to modify, alter, and enhance their physical attractiveness. The physical alterations include use of clothing, personal neatness and grooming techniques.

Although much attention is being centered on physical attractiveness, the area has not been extensively evaluated in terms of its relation to the speech variable of credibility. It is believed that attractiveness and credibility are two variables which can influence the listener's opinion of the speaker. The importance of credibility is reiterated in Clevenger and
Andersen's article "A Summary of the Experimental Research in Ethos." To enhance credibility the speaker might speak on a subject with which he is familiar or on one which he is an authority. The credibility factor may also be increased throughout the speech by ready references to a known authority.

It is evident the speaker can manipulate credibility and attractiveness, to certain degrees, to enhance his effectiveness. Is the audience conscious of the manipulation taking place? In many situations the audience is aware of the manipulation but the influence of such manipulation is ignored. Recent studies indicate the importance of credibility manipulation on the effectiveness of a speech. Attention is now being focused on the manipulation of the speaker's physical appearance. One of the next steps for study would be insight into the combined effect of physical attractiveness and credibility on the effectiveness of a speech. Perhaps then the question of audience awareness of manipulation of variables, such as appearance, will be answered.

**Statement of the Problem**

The purpose of this study is to determine the extent to which a speaker's physical attractiveness and credibility may influence the effectiveness of a speech. Many questions become obvious at the outset of such research:
1. Is speaker effectiveness determined by the speakers' physical attractiveness and credibility?

2. Will the attractive speaker be perceived as an effective speaker, other things being equal?

3. Will the unattractive speaker be perceived as a less effective speaker, other things being equal?

4. Additionally, will the study show which the audience thinks is of greater influence in evaluating the effectiveness of a speaker, physical attractiveness or credibility?

**Definition of Terms**

In the present study, physical attractiveness is defined in terms of the beholder's concept of the term. Within this framework, physical attractiveness is defined generally as the beholder's concept of bodily beauty; with limited reference physical attractiveness might include only hair color, a smile, or other facial features, or a mode of dress. (Monroe & Ehninger, 1974, p. 166).

Ethos is the audience's perception of the speaker's character as evidenced in the speaking situation. Several factors, such as the reputation and integrity of a speaker, can influence the credibility of said speaker. For testing and measurement purposes ethos or speaker credibility, in this study, is defined as the characteristics of the speaker as measured by an ethos.
semantic differential. The semantic differential scales that are used represent authoritativeness, character, and dynamism factors. (McCroskey, 1966, p. 65; Berlo, Lemert, & Mertz, 1970, pp. 569-570).

Effectiveness is a method of evaluating, in a positive or negative manner, how good or bad a presentation is. Effectiveness is determined by an individual's perceived guidelines and expectations based on the characteristics a positive evaluation of a speech, object or individual should possess. The guidelines for evaluation are obtained from "official" sources such as authorities in a related field, from exposure to positive models and from ideas formulated from discussion among learned people within the area one is evaluating.

Chapter Outline of Dissertation

Chapter Two presents a summary of important literature related to the present study. An early experimental study involving physical attractiveness and message/speaker impact is discussed; studies dealing with physical attractiveness and impression formation are reviewed; summary studies of credibility are cited; recent research on credibility as a dependent variable is reviewed; and a single study regarding the two variables of the present study, credibility and physical attractiveness, is included.

Chapter Three deals with the design of the experiment. The chapter states the hypotheses, explains and discusses the measuring device for determining credibility as well as reasons why this measure was used. Chapter Three also discusses selection of the
speaker. This chapter includes a definition of the independent variables, physical attractiveness, and sex. The independent variable describes the criteria in selecting the attractive and less attractive confederate speaker.

The development of the dependent measures for credibility and effectiveness, are discussed next. Also discussed are two speeches of introduction, one created to produce high credibility for the source and the other created to produce low credibility for the source. The third level of the credibility variable is also mentioned, which is the absence of either form of the introduction. The construction and delivery of the speech presented by the confederate is discussed next. Finally, Chapter Three discusses the subjects, and the procedure of the experiment.

Chapter Four presents the results of the experiment in chart and figure form. A discussion of the results is also included. Finally the conclusion of Chapter Four discusses implications of the findings and what areas need to be researched.
II. SUMMARY OF PREVIOUS RESEARCH

There are many articles in experimental research today that include either physical attractiveness or credibility as one of the variables. Conclusions drawn in these studies have been employed in many present day basic speech texts. Ehninger and Monroe (1974, p. 165) indicate the importance of physical attractiveness in their discussion of nonverbal delivery:

Among the many nonverbal signs and cues provided by a communicator and interpreted by listeners we must consider of predominant importance the speaker's physical aspect, bodily and gestural behaviors, and the facial mirroring of emotions and feelings. These nonverbal cues may be employed consciously and positively by the speaker to increase communicative impact and message effectiveness. Conversely, if through neglect or insensitivity the speaker's physical aspect and behaviors are such as to confuse or antagonize the listeners, the import and impact of the message will almost certainly be weakened or perhaps, lost entirely.

One of the earliest studies to show the relationship between physical attractiveness and message/speaker impact was the 1921 study of F.A.C. Perrin. He found that observers are particularly reluctant to admit that their reactions are influenced by physical attractiveness. Yet the growing body of research reveals that the average person underestimates the influence of physical attractiveness on his social behavior.
Among the research which has shown that observers attribute desirable traits to the physically attractive and undesirable traits to the physically unattractive are the studies of Byrne (1968), Dion (1972), and Miller (1970). Miller (1970, p. 243) found that the attractive were judged to be more likeable, friendly, confident, sensitive, and flexible than the physically unattractive.

Past studies have also shown that physical attractiveness affects impression formation. Dion (1972, pp. 285-290) used college students to attribute personal perception traits to pictures of students who were attractive, unattractive, and average in looks. She found that attractive persons were assumed to be better prospects for future happiness. Also the physically attractive persons were thought to possess more socially desirable personalities than those not so attractive.

The basic premise that personal attractiveness affects impression formation is further supported by the work of Berscheid. Berscheid (1972) suggests that physically attractive individuals, as compared to unattractive individuals, generally have a considerable social advantage. In the Berscheid and Walster study, forty-four male subjects were shown pictures of four girls: two that were judged physically attractive and two less attractive. The subjects more frequently chose the more attractive females for dates.
Considering the aforementioned studies of Dion, Byrne, Miller and Berscheid, Aronson (1965, pp. 229-230) concludes:

It appears to be true that physical beauty is more than skin deep. We are more affected by physically attractive people than by physically unattractive people, and unless we are specifically abused by them, we tend to like them better. . . . This begins at a very early age. The disconcerning aspect of these data is that there is a strong possibility that such preferential treatment contains the seeds of a self-fulfilling prophecy: we know that, if people are treated poorly (or well), it affects the way they come to think of themselves. Thus homely children may come to think of themselves as "bad" or unlovable, if they are continually treated that way. Ultimately, they may begin to behave in a way that is consistent with this self-concept, a way that is consistent with how they were treated to begin with.

Indeed physical attractiveness is an important variable in the daily activities of man. Therefore the variable of physical beauty lends itself to more research, both as an independent variable and with other variables.

It was not until recent years that physical attractiveness and credibility have been grouped together in experimental studies. This is not to indicate that credibility studies do not exist. On the contrary, the early studies of credibility frequently give mention to the Kulp study of 1934. Kulp found that a credible source is more influential than a source noted to be an ordinary citizen. Working on this general premise, Haiman sought to find ways to enhance ethos or the credibility of the source.

Haiman found that the introduction of a speech can be used as a means of establishing ethos before a speech is given. In his
doctoral study, Haiman (1942) found that variations in the 
prestige of a speaker, produced by varying the chairman's 
introductory remarks, were found to influence significantly the 
effects of a persuasive speech. Haiman also found the persuasive 
effect of the speech could be altered by inclusion of variations 
in the overall ethical appeal of speakers. The variation of the 
overall ethical appeal was produced by having persons of different 
ethical appeal deliver the same speech. As previously stated, the 
speaker with the highest ethos could significantly determine the 
effects of a persuasive speech.

The Hovland and Weiss study of 1951 expanded the Haiman 
results. Their study was concerned with the effects of communication 
from high and low credible sources. The subjects were asked to rate 
possible sources on a credibility scale. Five days later, both high 
and low credibility speakers were given pro and con articles on four 
topics that were to be delivered as speeches. Hovland and Weiss 
found that the subjects' attitudes toward the speakers before the 
speeches were directly related to their evaluations of the 
presentations.

Studies followed that substantiate these findings. Later 
a variety of other variables were grouped with credibility for 
experimental research. Andersen and Clevenger (1963) attempted 
to gather this information in a summary work. In their article, 
"A Summary of Experimental Research in Ethos," Andersen and
Clevenger conclude that to increase credibility one should have a well reasoned speech, a speech that meets the audiences' expectations and thus raises one's credibility, and the most influential item is to have someone introduce you favorably.

Realizing that the Andersen and Clevenger summary work was not intended to answer all credibility questions, the experimental studies on credibility continued. Researchers experimented with additional variables to determine which variable, if any, would increase credibility. The Ostermeier study (1967) suggested reference, first-hand or association with those with first-hand knowledge, as a variable to increase credibility. The results indicated the opposite, that type and frequency of reference did not interact in affecting perceived trustworthiness and dynamism, both traits of credibility. The receivers rated an unfamiliar source as less competent, less trustworthy, and less dynamic than a familiar source. The familiarity of the source was based on the use of references within the actual message. Thus references, as indicated in an actual speech, increased source credibility only for the familiar source.

In 1968 Sereno expanded the number of variables associated with credibility. He sought to determine the extent ego involvement and high source credibility effected the response to a belief-discrepant communication. Sixty-four subjects were selected as highly or lowly involved on the basis of a pretest. The belief-
discrepant message was presented in the form of a reproduced newspaper article. Depending upon whether a subject's pretest evaluation of the topic was positive or negative, one of two messages was presented: "Salk Calls for Wider Birth Control Use," or "Salk Sees Birth Control Dangers." After reading the article the subject responded to the topic and source, the author of the article, on a semantic differential scale. The study revealed that a highly involved subject changed his attitude in the direction advocated less than the lowly involved subject. The results also indicated that highly involved subjects tend to lower their evaluation of a highly credible source more than lowly involved subjects.

In the early 1970's the credibility research was expanded to include studies on stylistic and structural variables. Two examples of this type of study follow. The Applbaum study (1972) proposed to investigate the variant factor structure of source credibility within the context of situations in which communication typically takes place. Thirty-one bi-polar semantic differential scales were selected to represent four factors of source credibility: trustworthiness, expertness, dynamism, and objectivity. Three speaking situations were chosen for the study: 1) a speech in a classroom, 2) a speech delivered to a social organization, and 3) a sermon delivered in a church. The subjects were asked to utilize the scales to describe what an "ideal speaker" should be
like in each of these situations. The study revealed that the audience expects different qualities of a speaker in different situations. Trustworthiness, for example, appeared to refer to different variables in each speaking situation. Thus the different variables had different levels of importance within each speaking situation.

The Carbone study of 1975 revealed several stylistic variables that are related to source credibility. Undergraduate speech students prepared a five minute speech on one of the topics given them. All participants discussed the same major issues to control for variability. The speeches were tape-recorded and transcribed for use by the judges.

The panel of judges rated the speaker's credibility on the basis of the speech. It was concluded that a high credible source encoded a message containing a greater degree of listenability, more human interest, greater vocabulary diversity, and use of more realism than did the low credible source.

The studies cited above have been included to point out the diversification of variables that have been studied with speaker credibility. The studies are only a representation of the studies in this area and are by no means all inclusive of the studies involving speaker credibility. Likewise the physical attractiveness studies cited are only representative of the many studies on that variable.
The preceding review of literature on physical attractiveness and credibility is an attempt to emphasize the importance of these variables. It also serves to show how the variables may be manipulated to determine or influence the outcome or effectiveness of a speech. At the same time one can observe that very little attention has been given to credibility and physical attractiveness in their combined influences on communication effectiveness.

One study which closely related the two variables, however, was the Widgery study. This study was concerned with physical attractiveness and sex of the sources as determinants of initial credibility perception.

The Widgery study (1974) began with a belief based on Berscheid et al. findings, that female persons evaluate less on the basis of physical criteria and more on other factors. The study hypothesized, based on the preceding comment, that it is reasonable to expect females to make different evaluations of credibility than males regardless of the relative physical attractiveness of the source.

The subjects were shown four pictures, one each of a most attractive female, a most attractive male, a not-so-attractive male and a not-so-attractive female. The subjects then rated each picture on eighteen, seven-point semantic differential scales representing three levels of credibility. The results showed the
safety (p<.001) and dynamism (p<.01) dimensions of credibility were perceived to be significantly higher for the physically attractive sources.

In the safety (p<.001) and qualification (p<.01) dimensions, the female receivers perceived credibility to be higher than did the male receivers. Thus the results support the view that sex of the receiver and attractiveness of the source was important factors to consider in the process of initial credibility perception. The results also support the view that people tend to make early credibility judgments on the basis of whatever information is available. When little or no verbal information was offered, aesthetic information became salient in interpersonal perception. There still exists a need to determine what function physical attractiveness plays in the communication process after the speaker begins his message.

Credibility has been studied with a variety of variables but only in a limited way with physical attractiveness. Even fewer studies are available involving physical attractiveness and credibility in relation to the effectiveness of a speech. Each of these variables on its own does much to influence the listener and his evaluation of the speaker. Therefore, it seems fitting that one should group physical attractiveness and credibility together to see how they influence the listener's ratings of the effectiveness of a speech.
III. THE METHOD

To answer the specific research questions stated in the previous chapter, a series of hypotheses were formulated. Following are the null hypotheses:

1. a. There is no significant difference in subjects' scores on the measure of character between those who saw an attractive speaker and those who saw an unattractive speaker.

b. There is no significant difference in the subjects' scores on the measure of dynamism between those who saw an attractive speaker and those who saw an unattractive speaker.

c. There is no significant difference in subjects' scores on the measure of authoritativeness between those who saw an attractive speaker and those who saw an unattractive speaker.

d. There is no significant difference in the subjects' scores on the measure of effectiveness between those who saw an attractive speaker and those who saw an unattractive speaker.

2. a. There is no significant difference in subjects' scores on the measure of character between those who saw a high credible introduction, those who saw a low credible introduction, and those who saw no introduction.

b. There is no significant difference in the subjects' scores on the measure of dynamism between those who saw a high credible introduction, those who saw a low credible introduction, and those who saw no introduction.
c. There is no significant difference in subjects' scores on the measure of authoritativeness between those who saw a high credible introduction, those who saw a low credible introduction, and those who saw no introduction.

d. There is no significant difference in subjects' scores on the measure of effectiveness between those who saw a high credible introduction, those who saw a low credible introduction, and those who saw no introduction.

3. a. There is no significant difference in subjects' scores on the measure of character between male subjects and female subjects.

b. There is no significant difference in subjects' scores on the measure of dynamism between male subjects and female subjects.

c. There is no significant difference in subjects' scores on the measure of authoritativeness between male subjects and female subjects.

d. There is no significant difference in subjects' scores on the measure of effectiveness between male subjects and female subjects.

There are four possible interaction effects for each of the four ANOVA's:

a. attractiveness x introduction x sex
b. attractiveness x introduction
c. attractiveness x sex
d. introduction x sex

Neither theory or previous research give a clear indication of whether one can expect to find any significant interaction between attractiveness x introduction x sex or introduction x sex on any of the four dependent measures.
However, both theory and some previous research, such as Perrin, 1921, and Dion and Berscheid, 1972, suggest that there might be an attractiveness x introduction interaction and that there will probably be an attractiveness x sex interaction. Furthermore, the interaction between attractiveness and introduction is anticipated because research has shown that introductions affect both credibility and effectiveness. We also know that attractiveness affects credibility or may in fact be a component of it. Interaction between attractiveness and sex is expected since the speaker is female. Thus one might well expect that her attractiveness or unattractiveness would affect one sex differently than it does another.

Materials and Measuring Instruments

Measuring Instruments

Semantic Differential. The semantic differential measuring instrument was selected for the present study because it had been shown to be an effective technique for measuring credibility as a variable. The semantic differential had been frequently used in research in credibility and had been successful in assessing one or more of the aspects of credibility, according to Andersen and Clevenger (1963, p. 78).

The McCroskey study (1966, p. 70) concluded that the semantic differential was highly capable of measuring credibility
on two factors of dimensions: trustworthiness (character) and qualifications (authoritiveness).

A twenty item, seven choice semantic differential scale was constructed for use as an indicator of the listener's perceived credibility of the speaker. Scales used to measure the authoritativeness dimension of credibility were reliable-unreliable, informed-uninformed, qualified-unqualified, expert-inexpert, has professional manner-lacks professional manner, and intelligent-unintelligent.

Scales used to assess the dynamism dimension were: forceful-forceless, aggressive-meek, energetic-tired, emphatic-hesitant, cheerful-gloomy, bold-timid, and active-passive. And the terms used to assess the dimension of trustworthiness/character were: reputable-disreputable, awful-nice, unsure-sure, friendly-unfriendly, honest-dishonest, pleasant-unpleasant, and trustworthy-untrustworthy. (McCroskey, 1966, p. 72; Berlo et al., 1970, p. 571). Appendix A is a copy of the complete semantic differential. To eliminate any possible set response, the positive and negative ends of the bi-polar scales were alternated. For scoring purposes, the steps of each scale were assigned a value from 1 (negative) to 7 (positive). (Osgood, Suci & Tannenbaum, 1975). The semantic differential was scored on each of the three levels of credibility. Thus the subject had a separate score for each level of credibility.

A similar eight-item, seven-choice semantic differential was constructed to assess the subject's perception of the effectiveness
of the speech. The evaluative terms were bi-polar adjectives: good-bad, valuable-worthless, and wise-foolish. (Sereno, 1968, p. 478). Other terms used as fillers included: hard-soft, weak-strong, slow-fast, heavy-light, and active-passive. For scoring purposes, the semantic differential scale was assigned values of 1 (negative) to 7 (positive). To eliminate any possible set response, the positive and negative ends of the bi-polar scales were alternated. (See Appendix A). A single mean score of perceived effectiveness of the topic was obtained for each subject.

Choosing A Speaker

The speaker was chosen from a field of five speakers recommended by Speech instructors, as attractive and average or above in their speaking ability. In an attempt to secure objectivity and variety the first five female students recommended were selected to be rated by the panel. The subjects were then photographed. A panel of seven Speech faculty members from Northeast Louisiana University served as judges in rating the speakers' photographs. Based on a seven point semantic differential scale (+3 attractive, 0 neutral, -3 unattractive), the judges were asked to rate the speakers on their physical attractiveness. Appendix B is a copy of the Semantic Differential Scale used to rate the speakers' attractiveness. The subject chosen as the confederate speaker received the highest mean score on the seven rating forms, which was 1.53.
The speaker chosen as the most attractive was dressed and made-up to appear unattractive. Five less attractive speakers were recommended by Speech instructors, who were not on the rating panel. Pictures of the subjects were then shown to the same panel of NLU faculty members who rated the speaker as attractive. Based on the same seven-point semantic differential scale used in the attractive judgment (+3 attractive, 0 neutral, -3 unattractive), the photos were evaluated. The subject receiving the lowest mean score, -1.43, was chosen the most unattractive subject. The most attractive subject, with the aid of unbecoming make-up and ill-fitting clothes, was chosen the not-so-attractive subject.

**Development of Independent Variables**

By the hypotheses, this study was directed toward the physical attractiveness and the credibility of the speaker (confederate) and the subjects' perception of the effectiveness of the speech. Effectiveness and the three levels of credibility served as dependent variables in the experiment.

The independent variables of this experiment were physical appearance with two levels: attractive and less attractive, and sex, either male or female. The two levels of physical attractiveness required that the same confederate speaker appear in both speaking situations. In one instance, the confederate was dressed
attractively, her hair neatly styled, with attractive use of make-up, and good posture. In the unattractive situation, the same speaker appeared in rumpled, ill-fitting clothing, dirty, greasy looking hair, unattractive make-up; and used poor posture. The following section will describe the construction and make-up of the independent variable physical attractiveness.

**Manipulation of Physical Attractiveness**

The physical attractiveness of a speaker was discussed by authors of speech texts which indicate the importance of looking one's best. Studies have revealed that listeners do not believe physical attractiveness plays an important part in their perception of the effectiveness of a speaker. The present study will seek to show how manipulation of the speaker's physical attractiveness does indeed influence the listener. In the present study the confederate served as both the attractive and unattractive speaker so variations in gestures, vocal delivery, and facial expressions would be controlled. The attractive speaker dressed in a complimentary dress, with matching vest. The experimenter applied the subject's make-up to enhance the attractive natural features. Eye make-up was limited but the eyes were a focal point of the face, the cheekbones were high-lighted, and the lips were colored with orange-red to give a bright but natural affect, one that is successfully employed by national female television broadcasters. The hair was styled in a
becoming fashion. In the unattractive condition, the speaker was
dressed in a skirt with loose fitting blouse and rumpled, ill-fitting
vest. The hair was dampened to create a flat hair style with an oily
look. Base make-up was applied over cold cream to give the face an
oily, greasy look. Brown eye shadow was applied under the eyes for
a bag effect, and on the upper lip for a mustache shadow. Finally,
make-up was applied to the eyebrows and eye lashes so the features
faded on the face of the speaker. The second independent variable
was sex. Each group of subjects consisted of both males and females,
but not in equal numbers.

**Development of the Dependent Variables**

In the hypotheses stated in the present study the interest
was directed toward the three levels of credibility and the variable
of effectiveness. The present study required that two different
introductions of the speaker be constructed, one with high
credibility and one with low credibility.

**Construction of the Introductions**

One type of ethical appeal of a speaker was described by
Aristotle as any proof existing beforehand and not supplied by the
speaker himself. (Thonsen, Baird, & Braden, 1970, p. 65). The
introduction of the speaker was not supplied by the speaker himself.
Based on previous studies of credibility, the speaker's image was
created by telling the audience they would hear a speech from someone other than the actual speaker himself. The speaker's name and occupation were modified to fit the introduction as needed. The introductions were presented by the experimenter and were recorded on video tape.

The low credible source introduction identified the speaker as Kathy Lewis, an NLU student. To establish a lack of expertise in the subject area of the speech presented, the introduction described her as having some thoughts on the subject. Appendix C is a complete text of the low credible introduction. The high credible introduction had a formal note. It introduced the speaker as Miss Katherine Lewis, a member of the consumer department of the General Motors Plant in Monroe, Louisiana. Miss Lewis was further credited with distinguishing herself as a representative in numerous hearings on car safety throughout the country. She was also credited with working on a future publication on car safety. A complete text of the high ethos introduction appears in Appendix C.

In order to determine attitudes of the subject population toward the administration of the General Motors Plant a semantic differential pre-test was given. The seven-point semantic differential was administered to thirty-four students randomly selected from the same population that yielded the 221 subjects. The subjects in the pretest did not take part in the main experiment. The mean pre-test score was 5.15. The experimenter believed the result to be adequate
for purposes of establishing credibility of the GM Administration for this experiment.

**Construction of the Speech**

Only one speech was constructed as the same speech was used in all situations of the present study. The construction of the speech was aimed at producing an informative speech as possible. Seven faculty members from the Communication Arts Department at Northeast Louisiana University were asked to rate the speech. The rating was achieved by administering a 7-step Likert scale. (See Appendix D). The scale was rated 1 - 7; with the values assigned 1 negative and 7 positive. A mean score of 5.8 was computed for the judges. The experimenter believed this score was sufficient to support the adoption of the speech.

There was no introduction given by the speaker. There was no attempt to establish rapport with the audience. The speech began with content material and a brief preview that lead to the main proposition. The speech presented new and familiar material on the topic. The language used in the speech contained no technical terms which the audience could not comprehend, nor any slang expressions which might distract from the speaker's credibility. The length of the speech was approximately four hundred words. The speech took three minutes and fifty-seven seconds to deliver in the attractive presentation, and it took three minutes and fifty-five seconds to
deliver the speech in the less attractive situation. The informative speech listed and defined current and new devices in car safety. Appendix E is a complete text of the speech.

The speech was recorded on video tape. The appropriate introduction was edited to the speech so each of the desired six combinations of physical attractiveness and credibility could be obtained.

**Delivery of the Speaker**

The speech was written for the speaker, who was chosen earlier. The main theme of car safety was incorporated. The person selected as the speaker was a female, graduating NLU senior in her mid twenties. She had experience in speaking from two previous speech classes.

She was rehearsed and directed to assure the appearance of a spontaneous presentation under the experimental conditions. Because the use of prompting cards was necessary for the study, the speaker was rehearsed while using the cards.

In addition to being able to deliver the speech in a spontaneous manner, the speaker had to be able to adapt as an attractive as well as an unattractive individual. The speaker was able to appear as both attractive and unattractive. She was also believable in both levels of credibility as presented in the introductions.
The Main Experiment

Subjects

The subjects for the present study were students in sections of Speech 101, Speech Fundamentals and Speech 201, Public Speaking, at Northeast Louisiana University, in Monroe, Louisiana, during the Fall semester of 1980. The treatment groups varied in size, the smallest group having twelve students and the largest having twenty-four students.

For convenience, twelve groups were used to administer the experiment. Only six combinations of the variables existed, therefore Group 1 and 7 viewed the same tape, Groups 2 and 8 viewed the same tape, Groups 3 and 9 viewed the same tape, Groups 4 and 10 saw a tape with the same combination of the variables, Groups 5 and 11 saw the same tape, and finally Groups 6 and 12 viewed the identical tape.

The Speech sections used in the experiment were randomly selected. The experimenter did not consider other factors in her selection of the subjects. She randomly assigned the groups to the various treatment cells.

The randomly assigned treatments were as follows: Group 1, containing fourteen students, was assigned to see the attractive speaker and just the speech. Group 2, containing twelve students, was assigned to see the attractive speaker and the speech preceded by the low credible introduction. Group 3, containing eighteen
students, was assigned to see the attractive speaker and the speech preceded by the high credible introduction. Group 4, with twenty-five students, saw the unattractive speaker and just the speech. Sixteen students in Group 5 were assigned the unattractive speaker and the speech preceded by the low credible introduction. Group 6, containing sixteen students, viewed the unattractive speaker and the speech preceded by the high credible introduction. The remaining six groups were students from Speech 201 classes. The tapes viewed by the forthcoming groups were identical to the tapes the preceding groups viewed.

Group 7, containing twenty-one students, viewed the attractive speaker and just the speech. Twenty students in Group 8, saw the attractive speaker and the speech preceded by the low credible introduction. Group 9, with eighteen students, viewed the attractive speaker and the speech preceded by the high credible introduction. Twenty-four students in Group 10, viewed the unattractive speaker and just the speech. Group 11 with eighteen students, saw the unattractive speaker and the speech preceded by the low credible introduction. Group 12, with nineteen subjects, saw the unattractive speaker and the speech with the high credible introduction.
Procedure

The Treatment Groups

The instructors for each section of Speech 101 and Speech 201 selected for involvement in the experiment were sent letters confirming their response to participate. Two days before the date the experiment was to be conducted the instructors received another letter confirming the testing date and time. Only one monitor was available in the building where the speech classes met. Arrangements were made by the experimenter to switch rooms when necessary so all subjects viewed the same monitor. Each treatment group was scheduled at a different hour. The groups were scheduled October 1, 2, and 3, 1980. The following steps were used with each group:

1. Prior to the beginning of the appointed hours, the television monitor was turned on. The monitor was stationary in the room, located above the chalkboard, in a position advantageous to all members of the audience. The volume and fine tuning knobs were preset and so marked so as to insure the same setting with each group. Downstairs in the same building, in the control room, the tape was advanced to the point where the tape appeared.

2. At the start of the class hour, the experimenter introduced herself to the group. The instructor for the class was not present.

3. The subjects were told what they were to view had been taped. The subjects were asked not to make any comments during the video viewing.

4. The specific treatment, which had been cued on the video recorder beforehand, was replayed to the treatment group.
5. At the close of the tape the lights were turned on and the experimenter circulated a packet containing directions for the completion of the semantic differential, the credibility measure itself, and the effectiveness measure toward the speech (See Appendix A).

6. In each case, because not all subjects indicated that they were already familiar with the mechanics of the semantic differential, the experimenter asked the subjects to follow along as she read and explained the directions and sample semantic differential measure. (Osgood et al., 1975). The subjects were requested not to turn pages until requested by the experimenter to do so. (See Appendix A for complete set of instructions and sample of the semantic differential scale).

7. The subjects were given as much time as needed to complete the forms. The packets were collected and the subjects thanked for their co-operation. The experimenter told the group that she would visit them toward the end of the semester and report her findings to them.

The packets were counted and examined, and all were correctly completed. A total of 221 subjects were used in the study. The subjects absent and arriving late to the class were not allowed to participate in the experiment.

Homogeneity of Variance

The students in the present experiment were not equally divided by sex. And because students from two speech courses were included in the experiment the experimenter decided a homogeneity of variance test should be conducted. Therefore, before the results of the ANOVAS were used to test the hypotheses, the assumptions
underlying analysis of variance were tested. Assumptions which underlie the accurate interpretation of ANOVA results have been discussed by many authors. (McNemar, 1969, p. 289; Guilford & Fruchter, 1973, p. 235; Winer, 1971, p. 205). Each agrees on four assumptions: 1) the distributions for the population are normal, 2) samples are drawn at random, 3) samples are independent, and 4) variances of the samples are equal (homogeneity of variance).

There was no test conducted to determine if the population was normally distributed for each of the three components of credibility: character, authoritativeness, and dynamism; and the effectiveness component. However, some evidence (McNemar, 1969, p. 288) indicates that even if this assumption was violated it would not affect interpretation of the F ratios:

Although the assumptions are incorporated in the mathematical derivation of the F distribution, there is ample evidence that marked skewness, departures from normal kurtosis, and extreme differences in variance . . . do not greatly disrupt the F test as a basis for judging significance in the analysis of variance.

Sections of subjects were randomly selected, which satisfied assumption number 2. Random assignment of sections insured that the samples for each condition was independent, and satisfied assumption three.

Homogeneity of variance was tested for each ANOVA with the Cochran test recommended by Winer (1971, p. 208):
Another relatively simple test for homogeneity of variance developed by Cochran uses the statistic

\[ C = \frac{s_{\text{largest}}^2}{\sum s^2} \]

The parameters of the sampling distribution of this statistic are \( k \), the number of treatments, and \( n-1 \), the degrees of freedom for each of the variances. In most situations encountered in practice, the Cochran and Hartley tests will lead to the same decisions. Since the Cochran test uses more of the information in the sample data, it is generally somewhat more sensitive than is the Hartley test. In cases where \( n_j \), the number of observations in each treatment class, is not constant but is relatively close, the largest of the \( n_j \) s may be used in place of \( n \) in determining the degrees of freedom needed to enter the tables.

Table I shows the results and the data used to compute the Cochran Test. The results of the Cochran Test show the variances of the subjects in each cell are equal.
TABLE I

HOMOGENEITY OF VARIANCE

<table>
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<tr>
<th></th>
<th>$A_1I_1$</th>
<th>$A_1I_2$</th>
<th>$A_1I_3$</th>
<th>$A_2I_1$</th>
<th>$A_2I_2$</th>
<th>$A_2I_3$</th>
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<td>$s^2 = 9.96997$</td>
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<td>N = 34</td>
<td>N = 35</td>
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<td>Anova B: Dynamism</td>
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<td>$s^2 = 17.53031$</td>
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<td>N = 49</td>
<td>N = 34</td>
<td>N = 35</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Anova C: Authoritiveness</td>
<td>$s^2 = 12.6989$</td>
<td>$s^2 = 16.4729$</td>
<td>$s^2 = 12.2941$</td>
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<td>N = 49</td>
<td>N = 34</td>
<td>N = 35</td>
<td></td>
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</tr>
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<td>Anova D: Effectiveness</td>
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<td>N = 34</td>
<td>N = 35</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

$A_1$ = attractive condition
$A_2$ = not-as-attractive condition
$I_1$ = no introduction
$I_2$ = low introduction
$I_3$ = high introduction
IV. THE RESULTS

Analysis of the Data

For the experimental hypotheses, the analysis of variance was chosen to provide an overall test of differences between the effects of the treatments. The analysis of variance enables one to make comparisons between the treatment groups and to determine which particular variable was accountable for the differences between groups.

A computer was used to compute the data. The SAS GLM (1979) (General Linear Model) was followed to derive the ANOVA because the experiment contained unbalanced data. The results of the ANOVAs follow.

Table II includes the ANOVA results for the character level of the credibility measure. The F ratio, 3.62, was significant at the .05 level for the main effect attractiveness. Therefore hypothesis la was rejected. The attractiveness variable was significant in determining a difference in scores on the character factor of credibility.

The data in Table III presents the ANOVA results for the dynamism level of the credibility measure. The main effect attractiveness F ratio is 3.18. Therefore, this F value is not
significant. Hypothesis lb is accepted. Attractiveness was not significant in determining differences between the dynamism scores of the subjects.

The ANOVA results for the authoritativeness level of the credibility measure are found in Table IV. The main effect attractiveness has an F ratio of .2270, which is not significant. Therefore hypothesis lc is accepted. Authoritativeness scores between the subjects who saw an attractive speaker and between the subjects who saw an unattractive speaker will not significantly differ. Based on these findings one can conclude that attractiveness had no significant effect on credibility.

Table V shows the ANOVA results for the measure of effectiveness. The F ratio of .2610 was not significant. Hypothesis ld was accepted. Therefore, attractiveness did not significantly determine differences in the effectiveness scores.

Next, the results concerning the second main effect, the introduction, will be discussed. Table II shows the results of the ANOVA for the main effect of the introduction on the character measure. The F ratio, 11.95 is highly significant. Hypothesis 2a is rejected. The introduction does significantly determine a difference in scores for the measure of character between subjects who saw a high introduction, those who saw a low credible introduction, and those who saw no introduction.
Table III includes data for the ANOVA for introduction as a main effect on the dynamism measure. The $F$ value of 6.13 is highly significant. Hypothesis 2b is rejected. Dynamism scores will differ significantly based on the introduction the subjects view.

The ANOVA results for the main effect introduction on the authoritativeness measure are found in Table IV. The $F$ value, 10.76 is highly significant. Therefore hypothesis 2c is rejected. The introduction does significantly determine differences in authoritativeness scores between the subjects who saw a high introduction, a low credible introduction, and those who saw no introduction.

Table V shows the data for the main effect introduction on the effectiveness measure. The $F$ ratio, 4.36, is significant. Hypothesis 2d is rejected. Differences in subjects' scores on the effectiveness measure were significantly determined by the introduction the subjects viewed, either the high credible introduction, the low credible introduction, or no introduction.

Based on the preceding results for the main effect introduction, there is a significant effect of the introduction on the levels of credibility. The determination of which level of the introduction was most significant will be discussed later.

Data in Table II shows the results of the ANOVA with sex as a main effect on the character measure. The $F$ ratio, less than 1,
is not significant. Therefore hypothesis 3a is accepted. Differences in scores on the character measure are not significantly determined by the sex of the subjects.

Table III presents data for the main effect sex on the measure of dynamism. The $F$ ratio, less than 1, is not significant. Hypothesis 2b is accepted. The male and female scores on the measure of dynamism were enough alike that sex did not affect the variable dynamism significantly.

Table IV includes data for the main effect sex on the measure of authoritativeness. The $F$ ratio, less than 1, is not significant, therefore hypothesis 3c is accepted. Sex of the subjects did not significantly influence differences in the subjects' scores on the authoritativeness measure.

Results of the ANOVA concerning the main effect of sex on the measure of effectiveness are found in Table V. The $F$ ratio, less than 1, is not significant. Therefore hypothesis 3d is accepted. Differences in the subjects' effectiveness scores are not significantly influenced by the sex of the subject.

The preceding results show that sex of the listener did not significantly affect the credibility measure or the overall effectiveness measure. In fact, the $F$ values for the main effect of sex were such that only a minute affect, if any, was present.

Possible interactions previously discussed did not occur as predicted. The sex x attractiveness and sex x introduction were not
significant on any of the four measures, character, dynamism, authoritativeness, or effectiveness. The attractiveness x introduction interaction F value of 3.60 was significant at the p < .05 level for the variable character. Therefore character was significant in determining an interaction effect between attractiveness and introduction. The same interaction of attractiveness and introduction was not significant for the dynamism, authoritativeness, or effectiveness measures.

The interaction of sex x attractiveness x introduction was significant at the F ratio of 3.27 or p < .05 for the variable dynamism. Therefore dynamism was significant in determining an interaction effect between sex, attractiveness, and introduction. The three way interaction previously discussed was not significant for the character, authoritative, or effectiveness measures. Therefore, only two of the anticipated sixteen interactions occurred.

The mean scores for the four levels of measurement: character, dynamism, authoritativeness, and effectiveness, were compiled. The means are divided according to male and female subject scores and according to the attractive or unattractive speaker the subject saw. The scores are also arranged according to the type of introduction the subject viewed. Finally, the mean score for each of three introductions according to each of the four levels of measurements is included. Table VI presents means for the character measure according to the aforementioned divisions. Table VII presents the means for the dynamism measure according to the above guidelines. Table VIII reveals
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<th>Main Effects</th>
<th>Sum of Squares</th>
<th>d.f.</th>
<th>Mean Squares</th>
<th>F</th>
<th>Sig. of F.</th>
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<td>11.95</td>
<td>0.0001**</td>
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<table>
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* p < .05
** p < .01
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* p < .05
** p < .01
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** p < .01
### TABLE V

**ANOVA D: EFFECTIVENESS**

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* * p < .05
the means for the authoritativeness measure, likewise in arrangement with the previously mentioned divisions. Table IX shows the means for the effectiveness measure according to the various divisions.

An overview of the Tables reveals that in the attractive speaker situations, the low credible introduction received the highest rating from the male subjects. Within the two remaining introductions no pattern of order was evident. In the unattractive speaker situation the male subjects' scores for various introductions did not emerge into a pattern or order. The high and low introductions were each chosen twice as most effective by the male subjects in the unattractive condition. The no introduction was consistently chosen least effective by male subjects in the unattractive situation.

In the attractive situations the female subjects consistently scored the speaker with the high credible introduction with the highest marks. The low credible introduction rated second highest. The no introduction situation received the lowest rating in the attractive speaker condition, based on female subjects' scores.

In the unattractive condition the speaker with a low credible introduction received the highest rating from the female subjects in the three levels of credibility. In the unattractive situation, it can be further noted that the high credible introduction received the second highest rating of all four measures that were compared. The no introduction situation was rated lowest by females in the unattractive situation.
It can be concluded that the male subjects rated the attractive speaker highest in the low credible situation. The female scores in the attractive condition allow one to conclude that the high credible introduction was rated higher than the no or high credible introduction.

The ranking pattern suggest several points. The male subjects may have perceived the low credible introduction as more credible than the high introduction. Thus the low introduction condition received a higher rating than the high credible introduction. The female subjects' rating results may suggest the desire of the female to project herself into a successful job situation. The female subjects may view the speaker as very successful, thus in a positive sense. The female subjects believing the speaker has done well in the business world believe in and identify with her. With these issues in mind the subjects then attribute positive characteristics to the speaker and rate her high.

The overall mean scores indicate the attractive condition was consistently rated higher in effectiveness than the unattractive condition. Finally the marginal means report the low credible introduction was rated more effective than the no or high credible introduction.

Table X reports the results of the effectiveness according to groups. The most effective situation was the attractive speaker/low credible introduction combination. The unattractive speaker/low credible introduction was ranked second highest in effectiveness. It
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TABLE X

EFFECTIVENESS SCORES

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1 = attractive condition
2 = unattractive condition
a = no introduction
b = low introduction
c = high introduction
was further indicated that physical attractiveness was not always a significant factor in determining effectiveness. The attractive speakers were not always chosen most effective.

Among the groups the highest effectiveness ratings were not determined by high credible introductions. The two speaking situations with highest effectiveness mean scores were the attractive speaker with the low credible introduction and the unattractive speaker with a low credible introduction, respectively. It was the third highest effectiveness rating that gave the attractive speaker with a high credible introduction mention. It is generally believed the above combination of attractiveness and high credibility would be first in effectiveness.

The implications of the study indicate that physical attractiveness may not be as important a factor as previously indicated. The attractive speaker with low introduction was first, followed in effectiveness by the unattractive speaker with low credible introduction. The attractive speaker with high credible introduction and the unattractive speaker with high credible introduction follow in rank, respectively. It appears a variable stronger than physical attractiveness and/or credibility was evident. The variable may be that of identity. The speaker chosen as first and second in effectiveness, differed in levels of attractiveness but both situations had the low credible introduction. The low credible introduction introduced the speaker as a student. This might indicate that the low credible introduction was perceived as more credible than the high credible introduction. This is explained by
the fact that the high credible introduction stated the speaker was part of the General Motors administration. This identity appears to have been a negative rather than a positive factor when discussing the issue of car safety.

Following a predicted pattern of rank were the speakers rated the lowest in effectiveness. The fifth and sixth ranked speakers were the attractive speaker with no introduction and the unattractive speaker with no introduction, respectively. This finding supports earlier research that a low credible introduction is better than no introduction.

Discussion

The present study indicated the introduction was the only main effect that was significant in determining significant differences within each measure, character, dynamism, authoritativeness, and effectiveness. More specifically the low credible introduction caused the greatest significant differences within the measures.

This study also revealed that sex and attractiveness had no significant affect on the four measures. The main effect sex was not significant to the extent that the male and female subjects were almost homogeneous. Furthermore, the predicted interaction of sex x attractiveness and sex x introduction were not significant on any of the four measures. The interaction of attractiveness x introduction was significant (p<.05) in the measure of character. The interaction of sex x attractiveness x introduction was significant (p<.05) only for the dynamism measure.
In general terms the rank (1 highest 6 lowest) of the speakers, based on the effectiveness mean scores were: 1) attractive low introduction, 2) unattractive low introduction, 3) attractive high introduction, 4) unattractive high introduction, 5) attractive no introduction, and 6) unattractive no introduction.

The results revealed that the introduction was predictable only in the low ranking of the scale of effectiveness. In other words, no introduction did not aid in the overall effectiveness of the speech. The low introduction in both the attractive and unattractive situations was rated the most effective. This can be attributed to the strong desire to identify with the speaker, a student. Therefore, the subjects rated the speaker high in effectiveness. On the other hand, the high effectiveness rating for the speaker could be the result of negative feelings toward authority, who in this instance was the automobile industry. This can be explained by the fact that an automobile industry representative speaking on car safety was not perceived as a high credible source. The speaker was in fact a biased source.

The introductions did have a significant effect on the three levels of credibility therefore it was evident the subjects did listen to and were aware of the introductions. The results indicate that the low introduction was perceived as the highest credible introduction. To determine the significance of the results the high credible introduction should be presented by someone who has distinguished himself but one that is not directly associated with the industry being discussed.
Following the preceding recommendation the anticipated distinction between the levels of credibility would be more easily identified. It is feasible that the introductions measured a characteristic other than the credibility of the speaker. The characteristic measured may be trustworthiness or the biases of the speaker.

The results of the study might be explained by the reasoning that the subjects were playing the role of the audience in the classroom setting. Thus they listened to the speech but took little or no note of the introduction and physical attractiveness of the speakers. Perhaps the entire idea of testing was so new to the subjects that they overcompensated by trying too much to do the "correct thing". Finally, maybe the time of the semester, which was mid-way, resulted in apathy among the student population involved in this experiment.

Therefore it can be concluded based on these findings that:

a. The speaker's effectiveness is not determined by the speaker's physical attractiveness. Perceived credibility does determine the speaker's effectiveness.

b. Perceived speaker effectiveness is not determined by attractiveness of the speaker, other things being equal.

c. Finally, credibility, as measured by three levels of introduction, is of greater influence in evaluating the effectiveness of a speaker, than is physical attractiveness.

Suggestion for Further Research

The present study attempted to group the variables effectiveness, credibility and physical attractiveness. Because the number of studies with this particular combination of variables are limited a follow-up study might be revealing. The results indicated a discrepancy
between the low and high credible sources. The high credible introduction should be altered to identify the source as highly credible but not as an individual directly related to or associated with the automobile industry. A duplicate study would reveal whether the ranking of the low credible source as most effective was the result of a poorly constructed high credible introduction, or whether the ranking results are significant based on the subjects involved in this experiment. A duplicate study in different parts of the state would be interesting to determine the differences in the subjects' perceived effectiveness of attractive and unattractive speakers. This type of comparison study might aid in the explanation of the ranking the speakers received in the present study.

This study used an informative topic. Perhaps a persuasive topic would reveal a greater difference in the results. Finally, the present study allowed each group to see only one speaker. Another study might allow the subjects to view an attractive and an unattractive speaker. A more obvious comparison should reveal interesting findings.
BIBLIOGRAPHY

Books


Articles and Periodicals


Ostermeier, Terry, "Effects of Type and Frequency of Reference Upon Perceived Source Credibility and Attitude Change," SPEECH MONOGRAPHS, XXXIV (1967), 135-142.


APPENDICES
APPENDIX A

Date ____________________

*TO BE RETAINED BY THE INVESTIGATOR:

EXPERIMENT SIGN-UP FORM

My signature, on this sheet, by which I volunteer to participate in the experiment on ______________________________

________________________________________

________________________________________

conducted by

________________________________________

Experimenter

indicates that I understand that all subjects in the project are volunteers, that I can withdraw at any time from the experiment, that I have been or will be informed as to the nature of the experiment, that the data I provide will be anonymous and my identity will not be revealed without my permission, and that my performance in this experiment may be used for additional approved projects. Finally, I shall be given an opportunity to ask questions prior to the start of the experiment and after my participation is complete.

Subject's Signature

60
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<tr>
<td>Sex:</td>
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<tr>
<td>Education:</td>
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<tr>
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SEMANTIC DIFFERENTIAL TEST FORM FOR SOURCE CREDIBILITY

INSTRUCTIONS

The purpose of this study is to measure the meanings of certain things to various people by having them judge them against a series of descriptive scales. In taking this test, please make your judgments on the basis of what these things mean to you. Following these instructions, you will find a different concept to be judged and beneath it a set of scales. You are to rate the concept on each of these scales in order.

Here is how you are to use these scales:
If you feel that the concept at the top of the page is very closely related to one end of the scale, you should place your check-mark as follows:

fair __X:_____:_____:_____:_____:_____:___ unfair

or

fair ___:____:_____:_____:_____:_____:__ X unfair

If you feel that the concept is quite closely related to one or the other end of the scale (but not extremely), you should place your check-mark as follows:

strong ____:__X:_____:_____:_____:_____:____ weak

or

strong ___:___:_____:_____:____:___ X:___ weak

If the concept seems only slightly related to one side as opposed to the other side (but is not really neutral), then you should check as follows:

active ____:____:___X:_____:_____:____:____ passive

or

active ___:____:_____:__X:____:____ passive
If you consider the concept to be neutral on the scale, both sides of the scale equally associated with the concept, or if the scale is completely irrelevant, unrelated to the concept, then you should place your check-mark in the middle space:

safe _____:_____::____X:_____::____ dangerous

IMPORTANT: (1) Place your check-marks in the middle of the spaces, not on the boundaries (the colons).

(2) Be sure you check every scale for every concept—do not omit any.

(3) Never put more than one check-mark on a single scale.

Do not look back and forth through the items. Do not try to remember how you checked similar items earlier in the test. (MAKE EACH ITEM A SEPARATE AND INDEPENDENT JUDGMENT.) It is your first impressions, the immediate "feelings" about the items, that we want. However, do not be careless, because we want your true impressions.
CREDIBILITY/ETHOS SEMANTIC DIFFERENTIAL MEASURE TOWARD SPEAKER

Rate the speaker on the form below:

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EFFECTIVENESS MEASURE TOWARD SPEECH

Rate the speech on the form below:

weak ___:____:____:____:____:____:____ strong
worthless ___:____:____:____:____:____:____ valuable
slow ___:____:____:____:____:____:____ fast
heavy ___:____:____:____:____:____:____ light
soft ___:____:____:____:____:____:____ hard
good ___:____:____:____:____:____:____ bad
active ___:____:____:____:____:____:____ passive
wise ___:____:____:____:____:____:____ foolish
APPENDIX B

SEMANTIC DIFFERENTIAL TEST FOR PHYSICAL ATTRACTION

Instructions

You are to complete a form the nature of which may be unfamiliar to you. You will read a statement which could be considered a comment about the subject who is pictured above. Place one X in the middle of the space which represents your opinion to the statement. Your answer to one question should not depend on your answers to any other other questions.

The overall physical attractiveness of the subject:

attractive ___:___:___:___:___:___ unattractive

The grooming of the subject:

attractive ___:___:___:___:___:___:___ unattractive

The mode of dress of the subject:

attractive ___:___:___:___:___:___:___:___ unattractive

The bodily beauty of the subject:

attractive ___:___:___:___:___:___:___:___:___ unattractive

The facial features of the subject:

attractive ___:___:___:___:___:___:___:___:___:___ unattractive
HIGH CREDIBLE INTRODUCTION

Hello. You are all members of a speech class so today you are going to hear a speech. It is my pleasure to introduce to you Miss Katherine Lewis. Miss Lewis is employed in the consumer department of the GM Guide Light Plant in Monroe. She has represented the auto industry in numerous hearings on car safety across the country. Miss Lewis is currently preparing a booklet on car safety. It is my pleasure to present to you Miss Katherine Lewis.

LOW CREDIBLE INTRODUCTION

Hello. You are all members of a speech class, so today you are going to hear a speech. The speaker is Kathy Lewis, a student at NLU. Kathy tells me that she has some thoughts on a particular subject and we've given her time today to tell you what they are - Kathy . . .
APPENDIX D

EFFECTIVENESS MEASURE TOWARD SPEECH

Rate the speech on the form below:

good ___:___:___:___:___:___:___ bad

foolish ___:___:___:___:___:___:___ wise

worthless ___:___:___:___:___:___:___ valuable

informative ___:___:___:___:___:___:___ uninformative

negative ___:___:___:___:___:___:___ positive

strong ___:___:___:___:___:___:___ weak
APPENDIX E

CAR SAFETY

The hustle, bustle of today's society has placed many in a hurried state. Many of the financial and occupational successes one experiences in today's society are reached directly or indirectly with the aid of a private vehicle. The vehicle, made of over 3,000 pounds of steel, glass, plastics, and an assortment of paints and rubber, is powered by an engine capable of speeds in excess of 100 miles per hour. Man and this vehicle will speed, run an occasional signal light and ignore stop and yield signs. If questioned he will tell you he is a "good" driver; yet, man and his machine are capable of destroying themselves and many others.

According to the Department of Transportation 3 out of 50 drivers are involved in some type of auto accident each day. At least one of these drivers will be killed or seriously injured. For them, the rush home has ended.

Because the deaths and injuries resulting from car accidents become a daily reminder of the destructive power of the automobile, the auto industry supports a continuous search for improved features in car safety.

The most commonly cited safety feature of the auto industry is the seat belt and shoulder harness. The belt and harness have recently been re-evaluated and restructured by the auto makers. Emphasis is placed on the added comfort and ease of use of the bodily restraints. The seat belt, which connects across the abdominal region, can be used in conjunction with the shoulder harness. Both are easy to connect and fit almost any person. The belt and harness can be released and removed in less than 20 seconds. Within 30 seconds the accident victim can be out of the car and away from added danger.

The National Highway Traffic Safety Administration estimates 50% of all serious car accidents could be prevented with the use of shoulder harnesses and seat belts. But according to a survey by Jack Martens, Automotive Engineer Director for Allstate Insurance, only 20% of all auto drivers use seat belts. The belt and harness can be effective but only when used. The greater problem of apathy, laziness or refusal to wear restraints has not been overcome.

The United States, often called a nation on wheels, cites auto accidents as one of her most serious problems. According to the Department of Transportation, about 47,000 Americans were killed
and over 5,000,000 were injured in traffic accidents in each year of the mid 1970's. Yet Americans refuse to buckle up!

As a result the National Highway Traffic Safety Administration has introduced a passive safety feature; the air bag. The air bag, still under investigation, is being noted for its workability. As a passive restraint device the driver does nothing to activate the device. The air bag inflates automatically at the time of a collision and provides a cushion for the occupant.

Robert Westgate, Auto Club Spokesman in the Air Bag Controversy, stated that for a mere $120.00, which is the cost of the air bag, approximately 100,000 of each 1¼ million injuries from car accidents can be avoided. Over 5,000 of the avoided injuries would be serious spinal injuries. The passive restraint appears to be a safety device to meet the present needs.

With each new technological advancement in the auto industry we are placed in greater danger. The car industry has taken steps to provide us with more and better features to save lives and reduce car accidents. The National Highway Safety Administration is supporting legislation to require safety features in cars, such as the air bag.

The car industry looks toward the future with the promise that soon the car will no longer be a danger to man. Rather, man will use the 3,000 pounds of steel and glass as it was intended; as a means of transportation; both efficient and safe.
VITA

Joyce Kocian Covington was born in Victoria, Texas, September 15, 1948, the daughter of Dorothy Volek Kocian and Edward E. Kocian. She graduated from Bloomington High School, Bloomington, Texas, in 1966, and received her Bachelor of Science degree with a major in secondary education from Texas A & I University, Kingsville, Texas in 1973. She received her Master of Arts degree with a major in Speech Communication from Northeast Louisiana University, Monroe, Louisiana in May, 1976. Mrs. Covington is married to Felix W. Covington. She has two children, Stacy and Paula. Currently she is serving as an instructor in the Communication Arts Department at Northeast Louisiana University in Monroe, Louisiana. She received her Doctor of Philosophy degree in Communication Theory from Louisiana State University, Baton Rouge, Louisiana in May, 1981.
EXAMINATION AND THESIS REPORT

Candidate: Joyce Kocian Covington

Major Field: Speech

Title of Thesis: The Communicator's Physical Attractiveness and Credibility as Determinants of the Effectiveness of a Speech

Approved:

Major Professor and Chairman

Dean of the Graduate School

EXAMINING COMMITTEE:

Date of Examination:

May 1, 1981