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ABSTRACT

This study examined the effects of heavy versus light television viewing on the degree to which children possess sex role stereotypes. Reference was made to content analyses of children's television programs, prime time dramatic programs, and commercials, to show that traditional sex role stereotypes are present in most aspects of television programming. It was thus assumed that children who watched more television would acquire greater knowledge of sex role stereotypes. A TV program checklist was used with children in grades K, 2, 4 and 6 and their parents, to determine the amount of time the children spent watching television. Those who watched 10 hours or less per week were categorized as low TV watchers and those who watched 25 hours or more were categorized as high TV watchers. A total of 80 children (5 boys and 5 girls in each category from each grade level) participated in the study. Each child was given Brown's It test to measure his or her sex-typed toy or activity preference. High TV watchers made significantly higher scores in the It test than low TV watchers, suggesting that TV viewing plays an important role in children's acquisition of sex typing. An attempt to measure longitudinal changes in followup testing one year later did not produce the expected results due to ceiling effects on the It test. Another sex stereotype measure was described and suggested for use in future research. (JMB)

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Television as a Source of Learning Sex Role Stereotypes*

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This whole symposium is concerned with influences on children's sex role behavior beyond those operating within the nuclear family. If you exclude the child's interaction with the mother and father, it's almost certain that the greatest influence on the acquisition of sex role development is to be found in the various mass media. Children spend incredible amounts of time watching television, reading books, and going to the movies. Among these various media, it has become pretty clear that television is capable of having a great impact on the child's development. Even if you make a very conservative estimate that the average child watches TV 16 hours per week, this means that by the age of only 10 the child has already viewed over 6,000 hours of TV. That also includes about 220,000 commercials.

It has been known for some time now that children can acquire a broad range of behaviors, attitudes, and emotional reactions by observing either live or symbolic models. While I don't have time to go into that research literature, I bring it up simply as a means of suggesting that there is every reason to assume that children will acquire sex role stereotypic behavior and attitudes if those stereotypes are depicted in TV programming. If the observation of

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models presented on TV does have a significant impact on children's learning of sex role stereotypes, then children who watch highly sex role stereotyped programs should acquire these stereotypes more readily than children who watch programs with low amounts of stereotyping. On the other hand, if it can be shown that most TV programming is highly sex role stereotyped, we would then only need to show a relationship between amount of TV viewing time and degree of acquisition of knowledge of sex stereotyped behavior. So, lets examine the behaviors and attitudes exhibited by male and female TV models.

There have now been quite a number of analyses of the amount of aggression depicted in different types of television programming, but very few attempts have been made to determine the amount of sex typing depicted. At this time, I know of only two studies which analyze the nature of role models present in TV programs intended for children. One of these (Sternglanz and Serbin, 1974), was completed by Sally Sternglanz and Lisa Serbin, who are also seated at this table. They had several judges rate male and female role models in different children's programs on 12 different behavioral categories. The programs included "Popeye," "The Harlem Globetrotters," "Superman," "Bewitched," "Sabrina the Teenage Witch," "I Dream of Jeannie," "Archie's TV Funnies," "Scooby-Doo," "Josie and the Pussycats," and "Pebbles and Bamm-Bamm." The first thing they found out was that a number of the most popular children's programs couldn't even be included in the study because they didn't have a single female character. Of those programs that were studied, 67% of the characters were males and 33% were females.

Also, the characters playing bad-guy roles were almost always males; females rarely had evil characteristics. They found that males were significantly more likely than females to be depicted as aggressive, instructive, and succorant, while females were more likely to be depicted as being deferent and as being punished for being very active. Females' behavior also tended to have no real environmental impact or consequence. In the other study, Streicher in 1974, had judges rate the Saturday and Sunday morning cartoons over a 9 week period in 1972. In this study she was only interested in the female role models presented. In general, she found that cartoon females were less numerous than males, and they also made fewer appearances when they were present. They had fewer lines, played fewer roles, were less active, occupied many fewer positions of responsibility, were less noisy, and were much more juvenile than males. Mothers in these cartoons tended to work only in the house, and males did not participate at all in the housework.

The two most thorough studies of sex-typing in TV programming were based on an analysis of prime-time television programs. In one of these studies, Gerbner (1972) observed 762 leading characters in dramatic programs over a 3-year period between 1967 and 1969. In the other, Tedesco (1974) analyzed the amount of sex typing occurring in non-cartoon prime-time programs over a 4-year period between 1969 and 1972. Together, these studies indicated that:

- 1) Only one-quarter of all the leading characters were female.
- 2) Female characters were much younger than males.
- 3) Females were more likely to be depicted as married, or "about to be" married.

4) Women were most likely to be cast in a leading role when some kind of family or romantic interest was central to the plot. In most cases some suggestion of sex was present.

5) Males were more likely to be cast in serious roles, while females were more likely to be cast in comic or light roles.

6) Generally males were more likely to initiate violence, but females were more likely to be victims. When females did engage in some form of violence, they were much less likely than males to get away with it.

7) Almost two-thirds of all females were unemployed in contrast to only one-third of all males. Of those that were employed some form of professional employment was most characteristic of both sexes. But the males who were employed tended to be fairly equally distributed across such employment areas as entertainment, business, government, health and education, while over 50% of the females were employed in some kind of entertainment area.

8) Finally, data obtained on the personality profiles of the leading characters, using a semantic differential type scale, indicated that females were depicted as being more attractive, more happy, warmer, more sociable, more fair, more peaceful, and more useful. Males were rated as being more rational, smarter, more powerful, more stable, and tolerant.

One final study is especially relevant to the data I will present shortly. Courtney and Whipple (1974) investigated the male and female role models that were provided on TV commercials between 1971 and 1973. They found that over 85% of the voice-overs in the commercials studies were men. Women were however, just about as

likely as men to be seen in the role of product representative. But the limits of this equality can be seen in the types of products that were represented by males and by females. They found that women were seen in a much more limited variety of occupations than they actually participate in. In one of their studies, they found that 75% of the advertisements using women as models involved products found in the kitchen or the bathroom. So, "The world for women in the ads is a domestic one, where women are housewives who worry about cleanliness and food preparation and serve their husbands and children. Seldom is a woman shown combining out-of-home employment with management of her home and personal life." (p. 116-117) Men, on the other hand, tended to be shown as beneficiaries of women's work inside the house rather than making some contribution to household work. Male product representatives were usually portrayed as being more dominant, as advice givers, and as demonstrators. They were depicted in a much broader variety of occupations, while women were usually depicted in some kind of home occupation or in the family.

So from the limited data that have been obtained, it appears that traditional sex role stereotypes are present in most aspects of television programming; this includes cartoons and other programs for children, dramatic prime-time programs, and commercials. Since this is the case, it follows that the greater the overall amount of TV watching by the child, the greater should be his acquisition of knowledge of those stereotypes. An analysis of the specific programs watched is not really necessary, since most programs are highly stereotyped. Although, of course, if individual programs were

rated for the amount of sex typing depicted, we would expect children who watched a greater proportion of highly sex typed programs to learn traditional stereotypes most readily.

In our first attempt to examine the relationship between TV watching and the learning of sex role stereotypes, one of my colleagues (Terry Frueh) and I obtained groups of heavy and light television watchers at different ages. We sampled both boys and girls in grades kindergarten, 2, 4 and 6. To obtain groups of high and low television watchers, we constructed a TV watching survey form on the basis of the TV Guide for the preceding week in the local St. Louis viewing area. A list was made of all programs for all 6 channels available for the preceding 7 day period. The list included the name and time of the show, along with the channel on which it was shown. Children in the two older groups (grades 4 and 6) completed the survey form in class, but children in the two younger groups took the form home, and it was completed by their mothers. In completing the form, children (or their parents) were asked to check each program that was watched during the previous week, and to estimate both the number of hours the child usually watched per week and the typicalness of the previous weeks viewing. Out of a total of 300 forms initially handed out to children at the 4 grade levels, 95% were returned. Out of those subjects who returned the survey forms, groups of high and low TV watchers were formed by retaining those whose viewing time for the previous week was 25 hours or more, or 10 hours or less. This was how we operationally defined high and low TV watchers. Five males and five females at each grade level were randomly chosen out of these

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high and low TV watching groups to be included in the balance of the study. This provided 20 subjects at each grade level and a total sample size of 80. A subject was kept in the study only if his (her) previous week's viewing was estimated to be typical of usual viewing habits and amount of viewing time. These subjects were then individually administered the It test (Brown, 1956). The It test is actually a measure of sex typed toy or activity preferences. The child is presented with a series of pairs of pictures depicting various toys or activities which are traditionally associated with either masculine or feminine sex roles, and is asked to indicate which of the two a "stick figure" called "It" would prefer. Those of you who are familiar with this test are aware that the It figure, which is supposed to be neutral with respect to its gender, actually has a male bias. However, since this bias should be operating similarly for both high and low TV watchers, the It test provides a good means of determining children's awareness of stereotypes operating with respect to various toys and other activities. Findings using this instrument indicate that children begin to demonstrate stereotyped preferences as early as the 3rd or 4th year. That is, the boys begin to show preferences for traditionally masculine activities, while the girls begin to show preferences for traditionally feminine activities. These trends increase as the child gets older.

We computed a 3-way analysis of variance on the children's It test scores; this included 4 levels of grades, 2 levels of sex, and 2 levels of viewing time. We found no significant interaction effects, but there were significant main effects for all three

independent variables. We found that older children were more sex typed in their preferences than younger children, $F(3, 64) = 4.2, p < .01$. But this was an expected finding and of no interest for the present study. We also found that boys appeared to be more sex typed in their preferences than girls, $F(1, 64) = 31.2, p < .01$. But again this finding may be accounted for by the fact that the It figure probably has a masculine bias and is not really a neutral figure. The most important finding for our present concerns was that high TV watchers had significantly higher scores on the It test than did low TV watchers, $F(1, 64) = 193.6, p < .001$. That is, children who watched TV 25 or more hours per week were significantly more likely than children watching 10 hours or less per week to say that the It figure preferred activities associated traditionally with sex role stereotypes of their own sex. The difference in mean It scores were very striking. Out of a maximum score of 84, the mean score for high TV watchers was 72, while the mean for low watchers was only 51. So these findings suggested to us that television watching does play an important role in determining the extent to which children learn information regarding sex stereotyped behaviors and attitudes. The lack of any interaction effects in our data suggests that this learning process is operating equally strongly for both older and younger children, and for both sexes. We were surprised by the lack of any interaction with grade level, since we assumed that as heavy TV watchers get older, they should become increasingly aware of sex role stereotypes.

Of course, the problem with such data is that the order of influence operating could actually be the opposite of the one we

would like to assume is operating. Or, some third variable which is highly correlated with amount of TV viewing time might be the key variable which accounts for the relationship between TV viewing time and stereotyp of sex role preferences. For example, social class differences might account for the data obtained. However, all of the subjects tested were drawn from the same middle class suburban St. Louis area. There was not sufficient range in social class for this variable to account for the findings. While we cannot draw any final conclusions about causality here, the frequently demonstrated power of observational learning makes it very difficult not to conclude that the acquisition of such sex typed toy and activity preferences among both boys and girls is strongly influenced by the heavily sex typed behavior exhibited by male and female sex role models present in virtually all aspects of television programming.

We have just recently replicated this study using the same set of subjects used in the first study. We wanted to compare the degree of sex-typing in the current toy and activity preferences among children who remained heavy TV watchers and those who remained very light TV watchers over the 15 month period. We found that 80% of our original sample retained their original classification 15 months later. 85% of the heavy TV viewers remained heavy viewers, and 75% of the light viewers remained light viewers. There was also no appreciable difference between grade levels or the two sexes in their consistency in viewing time across this 15 month period. Information was obtained by the same Experimenter on TV watching habits and sex role preferences (using the It test) using the same procedures adopted in the first study.

An ANOVA computed on their time 2 It scores provided pretty much the same picture provided by the initial study. That is, high TV watchers were significantly more sex-typed in their activity and toy preferences on the It test than low TV watchers, $F(1, 48) = 138.7, p < .001$. Similarly, older children were more sex typed than younger children, $F(3, 48) = 7.8, p < .001$. The sex difference present in the first study did not appear at time 2. Again, there were no significant interaction effects. We then computed a repeated measures ANOVA on subjects' It test scores. The nonrepeated factors were TV viewing time, sex of subject, and relative grade level (I say relative because all subjects were a grade higher at the time of the replication study; of course, the relative difference in grade levels was the same). The repeated factor was subjects' It scores at Time 1 and Time 2. We expected to find that all subjects became more sex typed in their preferences over the 15 month period (this positive relationship with age increase is usually found), but that children who were heavy TV watchers at both testing times would have increased at a more rapid rate than children who were light TV watchers at both testing times. In fact, however, we found the opposite order of change. In spite of the fact that high TV watchers showed more sex typed toy and activity preferences at both Time 1 and Time 2, low TV watchers showed a significantly greater increase in the amount of sex typing in their preferences than did high TV watchers $F(1, 48) = 25.49, p < .001$. That is, while both high and low TV watchers became more sex typed in their preferences at Time 2, low viewers showed more of a change than high viewers. While this outcome is in the

opposite direction of the findings we expected to obtain, an examination of the initial It scores obtained by these two groups of subjects made it clear what was happening here. The mean It scores at the initial testing were 72 for the high viewers, and 51 for the low viewers. Since the maximum score on the It test is 84, there was clearly a ceiling effect operating here. That is, because of their initial very high It scores, high viewers had less room to show an increase in sex typing at the time of the second testing. (Similarly, older children had less room to increase than younger children, and males had less room to increase than females.) So, the one thing which did become clear in this replication is that some measure other than the It test is necessary to show the progressive influence on the acquisition of knowledge of sex role stereotypes that the heavy viewing of highly stereotyped TV programs probably has. A longitudinal study of this type with younger children could make satisfactory use of the It test as a measure of the acquisition of sex role stereotypes, but if the study is begun with children as old as those used in our study, the heavy TV viewers will already have become so stereotyped in their preferences that there will not be sufficient room on the scale to reflect changes in knowledge of sex role stereotypes that must actually be occurring. I have just begun such a study using children attending the Fels nursery school. The It test should reflect any changes in sex role preferences over time with a sample of children this young. In this preschool study, we will also video tape children's free play behavior and rate the amount of sex typing occurring in their overt behavior, as well as their stated activity

preferences. This will give us the first data I know of relating TV viewing patterns both to children's knowledge of sex role stereotypes, and to the amount of stereotyping demonstrated in their overt behavior.

One of the difficulties with using the It test is that it is restricted to a measure of the amount of stereotyping in children's stated preferences for concrete types of activities. The concreteness of the test accounts for the ceiling effect that occurs by the 6th grade, and makes it inadequate to test many aspects of a child's knowledge of sex role stereotypes. We were also interested in children's expectations about how males and females differ along more abstract dimensions, such as more complex psychological characteristics. There was one measure that we came across which was designed to accomplish this end. It was developed by Bennett (1973) at Wake Forest University. Bennett used an approach similar to that used in the It test, but she used full bodied figures of a male and female rather than a stick figure. Subjects are told a number of 2 or 3 sentence stories and are then asked to point to the figure that the story is about. An example of one of her items is "One of these people is a shy person. They are quiet and afraid to talk to others. Which is the shy person?" Another item is "One of these people is very sure of themselves. They know they will do well in their new job. Which person is sure of themselves?" In total, there are 24 such items. Twelve of these tap such male stereotypes as assertiveness, self-confidence, ambitiousness, independence, dominance, etc.; the remaining 12 tap such female stereotypes as gentleness, emotionality, talkativeness, meekness,

etc. Categorization of these adjectives as being associated with a male or female sex stereotype was based on college subjects' judgments of a much larger group of adjectives as being typical of males or females.

This Sex Stereotype measure was also administered to children following the second administration of the It Test. So, while we only had data for this measure at Time 2, it did allow us to see whether the findings obtained with the It test extended to more abstract psychological characteristics associated with the two sexes. Also, since there are separate subtests for knowledge of male and female stereotypes, we were able to relate TV watching patterns to awareness of stereotypes associated with each sex. Three 4 x 2 x 2 ANOVAs were completed on subjects' stereotyped responses on male items, female items, and all items combined. The findings were very similar to those obtained using the It test. A TV watching main effect was obtained for all three analyses. That is, children who watched 25 hours or more of TV a week both initially and 15 months later gave more frequent stereotyped choices than children who watched 10 hours or less a week on both occasions on both the male items [$F(1, 48) = 22.7, p < .001$], the female items [$F(1, 48) = 61.9, p < .001$], and of course on items combined [$F(1, 48) = 96.8, p < .001$]. A very interesting Grade x TV watching interaction effect was also obtained on the male stereotype items. While high TV watchers made progressively more frequent stereotyped choices on the male items with increasing age, low TV watchers actually showed a linear decrease in frequency of stereotyped choices with increasing age. This suggests that children who

are low TV watchers more readily learn as they get older that so called "masculine" characteristics may actually be associated with either sex. Since heavy TV watchers probably see these masculine characteristics being depicted regularly on the TV screen, their sex stereotypic perceptions are maintained--and even strengthened.

While these findings consist of only correlational data, they are highly suggestive that heavy TV viewing by children can play a significant role in their acquisition of knowledge of sex stereotyped behaviors, attitudes and other complex psychological characteristics. Given the growing concern in this country with protecting children from development along stereotyped lines, it may be time to give sex typing in TV programs the same attention we have recently given to TV aggression.

References

- Bennett, S. M. Children's recognition of male and female stereotypes: A developmental analysis. Unpublished Master's thesis, Wake Forest University, 1973.
- Brown, D. G. Sex-role preference in young children. Psychological Monographs, 1956, 70 (14), Whole No. 42.
- Courtney, A. E., & Whipple, T. W. Women in TV commercials. Journal of Communication, 1974, 24, 110-118.
- Gerbner, G. Violence in television drama: Trends and symbolic functions. In G. A. Comstock & E. A. Rubinstein (Eds.), Television and social behavior. Vol. 1. Media content and control. Washington: Government Printing Office, 1972, pp 28-187.

Sternglanz, S. H. & Serbin, L. A. Sex role stereotyping in children's television programs. Developmental Psychology, 1974, 10, 710-715.

Streicher, H. W. The girls in the cartoons. Journal of Communication, 1974, 24, 125-129.

Tedesco, N. S. Patterns in prime time. Journal of Communication, 1974, 15, 55-64.

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