

The Learning of Consumer Knowledge and Consumer Skills in The Chinese Youths—An Integrated Model*

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《本文節要》

本文以社會學習途徑和家庭傳播型態兩個理論途徑，檢視國內年輕人消費知識和技巧的學習情形。調查對象為台灣省及台北都會區內，九所國中的七百一十二位青少年。作者使用LISREL變異數分析檢驗假設模式，來觀察這兩個理論如何共同影響消費學習的過程。

結果顯示，觀念導向 (concept-oriented) 的家庭傳播環境，似乎藉由人際傳播間接影響了消費知識和技巧的學習。就某方面而言，這兩個與傳播有關的理論模式說明了社會化的結果：單是社經地位對消費學習和社會學習的影響力很小；經常閱讀報紙和經常與父母、同儕談論消費的事宜，會增加消費知識和技巧的學習；年齡也是消費知識的有力預測因素。年齡並且影響台北都會區的青少年使用大眾媒介，和與他人交談消費事宜的行為。

* This paper was presented at the 39th Annual Conference of the International Association in San Francisco, CA. May 25-29, 1989

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INTRODUCTION

Adolescence is a crucial period for socialization. It is a time provided by society for the developing youngster to learn to behave like a mature adult and to try out various new social roles. During this time, the youngster needs to acquire various skills and attitudes that will prepare him or her to become an appropriately adjusted adult who can contribute to society in meaningful ways (Dusek, 1977). Learning to be a rational and sensible consumer functioning in a marketplace is one of the social roles for which adolescents need to acquire appropriate skills and attitudes.

Learning is impossible without some form of communication. In this paper two communication-related theoretical frameworks--the social learning theory and the family communication pattern approach--were utilized and integrated in examining the processes of acquisition of consumer knowledge and skills among the Chinese youths in Taiwan.

The social learning theories have been widely adopted in the study of children's and adolescents' consumer socialization in earlier studies (Moschis and Moore, 1978; Moschis and Churchill, 1978; Moschis and Moore, 1982; Ward and Wackman, 1971). The family communication pattern approach (Chaffee, McLeod and Wackman, 1973; Sheinkopf, 1973), which proposes the distinction of qualitatively different family communication environments, was used primarily in investigating teenagers' acquisition of knowledge about political and public affairs. Only a few studies have applied it to empirically investigate the learning of a consumer role and role-appropriate behaviors in adolescents (Moore & Moschis, 1978; Moore & Moschis, 1981; Moore & Moschis, 1983).

The two theoretical approaches mentioned above involve, to a varying extent, either interpersonal communication or mediated communication (e.g., mass media communication). It is reasonable to expect that the two theoretical frameworks cross one another and may be integrated into one generic causal structural model. However, no other researchers except this author have explored on this area (Kuo, 1987). Therefore, the main objectives of this study are: first, to examine empirically to what extent the two theoretical approaches explain jointly the learning of consumer skills in adolescents while controlling some important social structural background factors; and second, to test the predictive ability of each theoretical approach on the learning of consumer skills in the presence of the other.

A versatile multiple-indicator and causal-modeling method--Linear Structural Relation (LISREL) covariance analysis--was used in testing the hypotheses. With this structural equation approach, one is able to accomplish two objectives: (a) to assess and compare the relative explanatory ability of each competing theoretical model, and (b) to integrate the competing theories in one structural model so as to examine how the competing theories actually work jointly to affect the socialization outcome.

THEORETICAL BACKGROUNDS

Although there are no explicitly articulated rules for a consumer to abide by, some economic principles can be borrowed to describe the rational and utilitarian nature of a normative adult consumer. It is generally assumed that a normative and sensible consumer will always try to optimize utilization, namely, to maximize gains and to minimize costs.

According to the norms prescribed in most consumer educational texts (Herrmann, 1983), a rational consumer is supposed to behave in the market transaction in line with the following expectations:

(a) S/he should shop around looking for the best price instead of buying things impulsively.

(b) S/he should actively seek information and advice about those products with high prices and high perceived risks.

(c) S/he should be able to evaluate skeptically the selling claims made in advertisements.

(d) S/he should budget expenses wisely and save money for the future.

More expectations can be added to this list with regard to the "socially desirable" attributes and expectations of a rational consumer. Based on these norms suggested in the consumer educational texts, the author developed the concept of "consumer skills" which involves rational and socially desirable consumption behaviors demonstrated by a sensible and wise consumer.

The Social Learning Model

The social learning theory emphasizes sources of influence—commonly known as "socialization agents"—which transmit values, norms, knowledge, skills, and behaviors to the learner. These socialization agents may be any person or organization in direct or frequent contact with the learner, or in positions of primacy over, or saliency to the learner, or in control of social reinforcements for the learner.

The major mechanisms pertaining to the social learning processes—reinforcement, modeling, and social interaction—involve both mass media communication and interpersonal communication. Social interactions are interpersonal communication in essence which refer to discussion and consultation; whereas, modeling and reinforcement both involve (a) receiving information through observation and feedback, and (b) responding through behaving in accordance with the expected norms. The crucial point is the perceiving and communicating of the positive and negative social feedback by the individual and between the individual and his/her significant others. It is these positive and/or negative social reinforcements that motivate the individual to either learn or unlearn a certain behavior.

Role modeling and social feedback are crucial factors in determining if a specific behavior will be attended to, retained in memory, acquired in schema, and performed later in similar contexts. The greater the expected probability of reward, the more

likely the subject is to learn and perform the behavior. In earlier studies (Marshall and Magnider, 1960; Strauss, 1952) significant correlations have been found to exist between children's experiences with money and the extent to which parents "spent money wisely."

Conformity to peer group trends in consumption behavior can be explained in terms of seeking social approval from peers. Peer influence seems to change during adolescence, susceptibility increasing most during early-to mid-adolescence (Allen and Newston, 1972). Social acceptance and popularity with peers are highly valued by most adolescents. Vener and Hoffer (1965) reported that youths most frequently choose their peers as the people they aspire to emulate in their patterns of dress. Younger adolescents tend to refer to their mothers more frequently than do those adolescents in the higher grades.

Though peer influence increases considerably as children enter mid-adolescence (James, 1971; Kanter, 1970; Teter, 1966), parental influence still predominates in areas of more long-term concern, such as moral values, code of behavior, and religious beliefs. Peer influence tends to dominate in the realms of fads, music, dress, language and some aspects of social behavior such as dating (Fauman, 1966; Ford and Ellis, 1980; Huba and Bentler, 1980; Jennings and Neimi, 1968; Munns, 1972-1973; Stoneman and Brody, 1981). Only those adolescents poorly adjusted to their families tended to rely heavily on peers for emotional and social support.

Mass media have been cited as primary sources of information about new products (Churchill and Moschis, 1979). Churchill and Moschis (1979) reported that television provides a rich source for new product information that is utilized in intra-family communication and mediation for actual consumption practices. They also found newspaper reading to be a strong predictor of knowledge about consumer affairs, consumer skills and activism, and economic motivations for consumption. Ward and Wackman (1971) found that younger adolescents talked more with parents about specific consumption practices and acts, and that such intra-family communication seemed to mediate between exposure to advertising and purchasing for all adolescents.

Children may also acquire consumer skills through observation and imitation after mass media figures. Bandura (1971) argues that material objects may acquire social meanings that product endorsers transmit to children by means of granting "make-believe" social reinforcement and promises. When the depicted outcome of using or not using a certain product is viewed as real by naive children, they may imitate the product endorser's behavior and make purchase influence attempts. Aspect of mass media content--Hollywood, television, and sports celebrities--have some impact on adolescent dress behavior.

The Family Communication Pattern Approach

In studying political communication, McLeod and Chaffee (1973) developed a typology of parent-child communication based on the two dimensions of

“socio-oriented” and “concept-oriented” communication patterns. They assess that the two-dimensional typology identify qualitatively distinct and meaningful environments for youngsters which have different socialization outcomes.

The Socio-oriented communication tends to produce deference and to foster harmonious and pleasant social relationships at home. Children in homes characterized by such a communication environment may be taught to avoid controversy, to repress their feelings on extra-personal topics, and to give in on arguments with adults rather than risk offending others.

The concept-oriented communication focuses on positive constraints that help children to develop their own views about the world. Parents may, for instance, encourage a child to weigh all alternatives before making a decision, or they may expose him/her to controversy, either by openly discussing an issue or by discussing it with other adults in the child's presence. The two dimensions of communication patterns produce a four-fold typology of the following family communication patterns: (a) laissez-faire, (b) protective, (c) pluralistic, and (d) consensual.

Previous research has shown that family communication patterns have some impact on the child's cognitive development, political socialization, and mass media uses (Chaffee & McLeod, 1972; Chaffee, McLeod & Atkin, 1971; Chaffee, McLeod & Wackman, 1973; Sheinkopf, 1973). Only few studies focused on communication patterns within the family as a variable in the development of consumer skills (Moore & Moschis, 1981; Moore & Moschis, 1983; Moschis & Moore, 1978). In general, the study results seemd to suggest that consumer socialization process involves more than mediation of media effects, it may also be conditioned by the family communication environment. The data suggest that children from “pluralistic” families, where parents encourage open communication and discussion of ideas without insisting on obedience to authority, were more likely to have greater knowledge about consumer matters; they were better able to filter puffery in advertising; and they were better able to cognitively differentiate product-related information they were exposed to in the advertisements (Moschis & Moore, 1978, p.362).

Social Structural Factors—SES and Age

Socio-economic background, in effect, plays an essential part in locating individuals in their social environment. These locations, in turn, affect the learning process and the final outcomes of consumer socialization. There has been plenty of literature demonstrating that people from different social class tend to hold different values and attitudes toward life and across a variety of issues (Estvan, 1952, 1965; Katz, 1964; Kohn, 1976, Kohn, Schooler and Miller, 1983; Miller and Swanson, 1958). Viewed from the perspective that a particular social class is a group of individuals who share a common culture and manifest similar life styles, the concept of social class should be useful for understanding and predicting various consumption phenomena. Since human behavior is determined in large part by the particular elements of culture which are learned and transmitted from generation to generation,

different social classes should exhibit differences in values, motives, and other precursors to consumption behavior.

Many studies of consumer behavior have paid some attention to socioeconomic status and have treated it either as an antecedent or as a major explanatory variable. The further apart two people are in social class, the greater the difference has been found in their usage, purchase, and understanding of a product, especially among value-expressive products (Reisman & Rosebrough, 1955). These results tend to refute the contention of Bieda and Kassarian (1969) that differences in social class with regard to product preference have disappeared because of common exposure to mass media.

Positive relationships were found to exist between, on the one hand, children's experience with and knowledge of money, and on the other hand, age, IQ scores, and socio-economic status (Marshall and Magnider, 1960; Strauss, 1952). Williams (1970) concluded that children from upper socioeconomic family backgrounds demonstrate greater knowledge of economic concepts than their counterparts from lower socio-economic backgrounds. Warner (1960) and Martineau (1957) also noted that social class helps to predict the hierarchy of things for which people wish to spend money.

Age may serve as an indicator of many things including cognitive developmental stage, location of life cycle, cumulation of life experience, length of schooling, saliency of different developmental tasks and so forth. In other words, age is a developmental variable but in a multi-dimensional sense. In addition, age also seems to influence, to a certain extent, the youngster's mass media use behavior and the frequency and intensity of their communication with parents as well as with peers. Previous studies have shown that age is associated with the frequency of parent-child communication in general. Starting from the early adolescence, teenagers begin to reach out for social support, emotional support, and group identity from peers (Allen and Newton, 1972; Dusek,). As a result, parent-child communication may decrease as the youngsters mature; meanwhile, peer communication increases as a function of the adolescents' age. Age and socioeconomic status were both found to influence people's uses of mass media (Faber, Brown, and McLeod, 1979; James, 1971).

RESEARCH HYPOTHESES

Nine hypotheses regarding the social learning processes, family communication patterns and social structural variables in relation to the learning of consumer knowledge and consumer skills are proposed.

H1: Assuming that parents as a group are more skillful and experienced consumers than are adolescents as a group, frequent discussion with parents on consumption matters and frequent observations of parents' consumption be-

- havior are likely to enhance the children's learning of socially desirable or intelligent consumer behaviors such as comparing prices, saving money, and budgeting.
- H2: Adolescents who often look upon one another as social referents on buying things and frequently interact with one another on consumption matters will exhibit greater consumer skills.
- H3: Adolescents who exposed to informational content on television and in newspapers will exhibit greater knowledge about consumer affairs as well as greater consumer skills.
- H4: Assuming that adolescents often look to parents as role models, adolescents who reported that their parents exercising smart consumer skills would also report themselves exercising same kind of consumer skills.
- H5: Adolescents from a high SES background would read news content in newspapers more frequently as compared with those who were from a lower SES origin.
- H6: Older adolescents are likely to (a) read about news in newspapers more frequently; (b) watch less television programs; (c) interact with parents on consumption matters less frequently; (d) interact with peers on consumption-related matters more frequently; (e) exhibit greater knowledge about consumer affairs; and (f) exhibit greater consumer skills.
- H7: The four social learning processes are correlated such that exposure to informational content on television is positively related to exposure to news content in newspapers. Discussions with parents on consumptions related matters is also positively associated with interactions with peers. Media exposure and interpersonal interactions may reinforce one another.
- H8: The concept-oriented family communication pattern fosters consumer needs and behaviors geared to evaluating alternatives according to their objective and functional (non-social) attributes. Adolescents from homes in which a concept-oriented communication style is emphasized are more likely to show a high level of (a) knowledge about consumer affairs, and (b) consumer skills such as comparing prices, saving money, and budgeting.
- H9: The concept-oriented family communication pattern encourages open discussion and expression of different views, adolescents from such "pluralistic" families are more likely to (a) interact with parents on consumption-related matters, and (b) interact with peers on consumption-related matters.

RESEARCH METHODS

Data Collection

A cross-sectional survey was conducted in the metropolitan area of Taipei, the largest city in Taiwan. Respondents were selected from nine secondary schools located in the Metropolitan area of Taipei. Students from both junior middle schools (equivalent to 7th, 8th, and 9th grades) and high schools (equivalent to 10th, 11th and 12th grades) were selected into the sample. Two classes from each grade were selected. Since there are only required courses in Taiwan's secondary schools, the students selected should represent the average student population of each school. A self-administered questionnaire was distributed in a regular class session while the author was present in the classroom to answer questions or to clarify confusions. The participation rate of the students in each class was over 90 per cent. After cleaning the data, the author was able to obtain 712 usable and valid cases for analyses.

In Taiwan, it is more difficult to distinguish the socioeconomic status of the student's family by merely looking at the school districts. The student population of each school often represents a mixture of children from wealthy as well as from less affluent families. This is especially true in the high school student bodies. The students in Taiwan have to take a competitive entrance examination to be admitted to high schools after they graduated from junior middle schools. Those who are admitted to the best high schools are those who do well in the entrance tests but are not necessarily all from wealthy families.

In addition to age, the author used another stratification variable, the school's prestige (e.g., good, average, poor), in selecting the schools. Students in the good schools usually have much heavier school work load than those who are in the poor schools. The time that is devoted to school works may also have some impacts on their mass media use behavior, participation in recreational activities and even some types of consumption behaviors. To avoid such possible confounding biases, the author selected schools with different prestige statuses. As a result, students from good, average, and poor schools were all selected into the sample.

Measurement of The Theoretical Variables

Since multiple items were used in the questionnaire to measure most of the major variables (or constructs), it was a necessary procedure to check the measurement reliability for each multiple-item scale before that construct was used in the analysis. Cronbach's alpha, one of the most popular measures of internal consistency or equivalency (Zeller and Carmines, 1980), was computed for each scale. The Cronbach alpha of each scale and a description of how each index was constructed are reported in the following section. Following the suggestion of a two-step approach in analyzing a causal model (Anderson & Gerbin, 1988), confirmatory factor analy-

sis was run to examine the measurement structure for each latent construct as well as to test the construct validity. The final decision on selecting the indicators into the full model was based on two criteria: (1) adequate face validity, and (b) the associated lambda value from the confirmatory factor analysis.

Consumer Knowledge

Consumer knowledge is defined as the knowledge about consumer affairs and about the operations of the economic/financial systems in general. Objective knowledge measure was used. Each respondent was asked eight true/false questions on the following issues: rights of unit share holders, mortgage/down payment, inflation, sales taxes, bank account interest terms, insurance, expiration date of dairy goods, and so forth. The summated score of the eight questions was used as the single indicator to measure the level of consumer knowledge. High scores indicate greater knowledge about the consumer affairs and issues.

Consumer Skills

Consumer skills is defined as the frequency of exercising rational and intelligent market transactional activities such as money saving and price bargaining, etc. Two indicators were selected from the original five measures to be used in the analyses. The respondents were asked to indicate on a five-point scale how often they practiced the following activities (1) shopping around before buying something that costs a lot of money, and (2) checking sale information in the mass media before buying things. The Cronbach alpha for this measure is 0.57.

The Social Learning Variables

Both mass media communication and interpersonal communication are important social learning processes for the adolescents in acquiring consumer skills. Multiple indicators were used to represent the four latent constructs.

(A) Exposure to newspapers news (Eta 1).

Exposure to newspapers has three indicators: frequency of reading news about (1) government/politics, (2) economic issues, and (c) social issues. This construct conceptually reflects the pattern of reading newspapers for information rather than for entertainment. The Cronbach alpha for this measure is 0.51.

(B) Exposure to informational content on television (Eta 2).

This construct is also reflected by three indicators: (1) frequency of watching newscasts; (2) frequency of watching informational programs; and (3) frequency of watching informational game shows. This construct stands for the individual's exposure to informational rather than entertainment content on television. The Cronbach alpha for this measurement is 0.47.

(C) Frequency of interaction with parents on consumption matters (Eta 3).

Parents are usually the models of "smart shoppers" for their children. Discussions of advertising messages and consumption matters often provide the youngsters good opportunities to learn to be smart shoppers. Accompanying parents during shopping trips also provides opportunities of observational learning for children.

Three indicators were used to reflect this construct. The respondents were asked to indicate on a five-point scale how often they (1) went shopping with parents, (2) discussed advertisements and advertised products seen on TV with parents, and (3) consulted parent's opinions on buying things. These three indicators do encompass the social learning mechanisms of observation, social interaction, and modeling. The Cronbach alpha is 0.34.

(D) Frequency of communicating with peers on consumption matters (Eta 4).

Peer's influence start to increase drastically as children enter their adolescence. Therefore, peers also become important social referents on consumption behaviors. Four indicators were used to reflect this construct. The respondents were asked to indicate on a five-point scale how often they (1) went shopping with friends of their own age; (2) discussed advertisements and advertised products seen on TV with peers; (3) consulted friends' opinions on buying things; and (4) friends asked their opinions/advice on buying things. The resulting Cronbach alpha is 0.66.

The Family Communication Patterns

Family communication patterns are defined as the degree to which concept-oriented communication are presented in parent-child interactions in the family. The author chose to concentrate on the concept-oriented communication pattern because, conceptually, it relates more closely with the learning of consumer knowledge and skills. Three measures were used in the study which asked children how often the parents (1) encouraged open discussions of ideas and views; (2) encouraged the child to exercise independent thinkings on issues; and (3) encouraged the child to speak out his/her own minds. A five-point scale was used to measure the frequency. The Cronbach alpha for the measure of a concept-oriented communication pattern is 0.64.

Socioeconomic Status

In the survey questionnaire seven questions were asked: (1) Father's occupational status. (2) Mother's occupational status (if mother also works). (3) Father's education. (4) Mother's education. (5) Possessions in the home. (6) Father's monthly income. and (7) Mother's monthly income. However, the responses to the questions on father's and mother's occupation were uncodable because of many incomplete and inconsistent responses. Therefore, only three measures were used in the actual analyses: father's education, mother's education, and family income which is a summated measure of father's and mother's incomes. The resulting Cronbach alpha is 0.49.

Perceived Parent's Consumer Skills

In addition to teenagers' consumer skills, the perceived parents' consumer skills was also included in the model as an antecedent factor. These are perceptual measures. By including this perceptual concept, the author was able to ascertain that the parents did serve as role models for their child on consumer behaviors. It was expected that if children perceived parents as wise consumers, they would be more

likely to talk with parents on consumption related matters. This scale has three indicators. Each teenager was asked to report how often his/her parent(s) demonstrated the intelligent consumer behaviors such as (1) shopping around for the best bargain, (2) budgeting and planning ahead on savings and spendings, (3) keeping records of all spendings. The Cronbach alpha is 0.37.

THEORETICAL MODELS

The analyses consist of two steps: (1) a social learning model was tested on the two outcome variables—consumer knowledge and consumer skills; (2) the family communication pattern construct was added to the social learning model and the resulting integrated structural model was tested again on the same data set. In both models, important social structural antecedents were controlled. The LISREL covariance structural analysis was used in evaluating the hypotheses.

In using the LISREL covariance analysis, several assumptions are implied. First, the observed indicators are assumed to be multinormally distributed. Second, the residuals (zetas) are assumed to be uncorrelated with the exogenous latent variables (ksis). And third, the measurement errors (epsilons) are assumed to be independent from ksis, etas, and zetas but may correlate among themselves (Joreskog and Sorbom, 1984). Under these assumptions, pearson correlations in conjunction with the maximum likelihood procedure were used to estimate the parameters.

Model 1: The Social Learning Model

The first structural model (Figure 1) is based primarily on a social learning perspective, meanwhile, three important antecedent social structural variables are also included and controlled in the model. These three latent exogenous constructs are: socioeconomic level (Ksi 1), age (Ksi 2), and perceived parent's consumer skills (Ksi 3). The six latent endogenous constructs are: exposure to newspaper news (Eta 1), exposure to informational content on television (Eta 2), interaction with parents on consumption matters (Eta 3), interaction with friends on consumption matters (Eta 4), consumer knowledge (Eta 5), and consumer skills (Eta 6). The last two are the outcome variables of interest, whereas, the other four are the constructs representing the social learning processes.

Correlated disturbances (zeta's) instead of causal paths (beta's) are specified among the four social learning constructs. Conceptually and theoretically reciprocal causal paths are possible to exist among these four social learning processes because exposure to information on mass media may enhance interpersonal discussions, meanwhile, such discussions may encourage information seeking on media as well. Empirically, such reciprocal paths among the social learning processes have been observed (Kuo, 1985). To avoid the technical difficulty of estimating a non-recursive model, specifying correlated disturbances should be an acceptable alternative (Hargens, 1988).

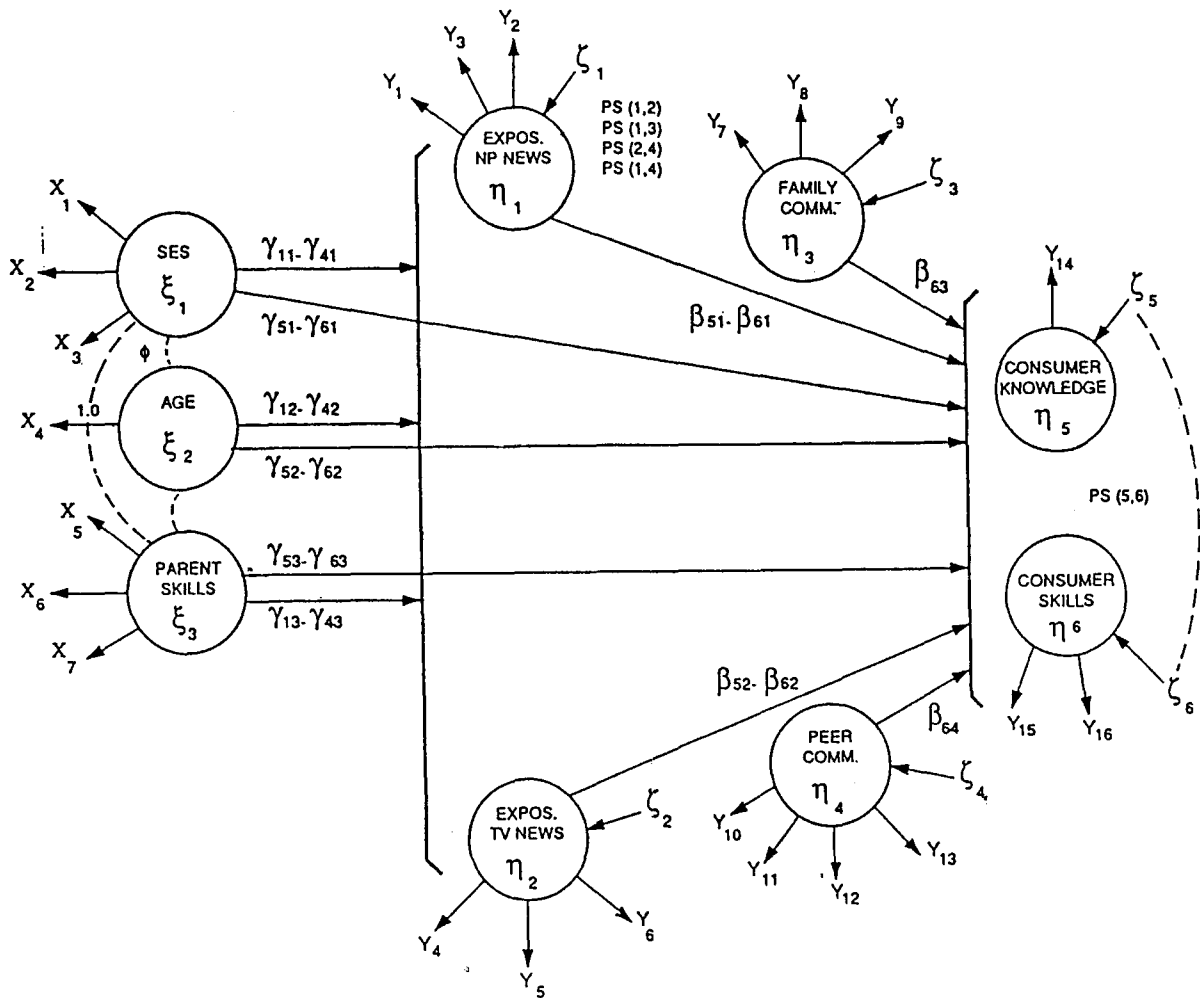


Figure 1: The Social Learning Model

Results from Model 1

Figure 2 presents the results from the first model. The standardized solution along with the various model fitting indices are presented. Only the parameters which are associated with a significant t-value (at .05 level) are presented. Since no consensus has been reached on which is the best goodness of fit index, it is desirable to examine multiple indices (Bagozzi & Yi, 1987; Wheaton, 1988). This model has a good fit which is indicated by the various model fitting indices. The chi square value is 496.1 with 201 degrees of freedom. Since the Chi square is sensitive to sample size and departure of multi-normality, we need to examine the ratio of chi square divided by the degrees of freedom. As a rule of thumb, a Chi square ratio of three or less shall indicate an acceptable fit between the data and the model (Carmines & McIver, 1981). Our Chi square ratio is 2.47. Two other goodness-of-fit indices devised by Joreskog and Sorbom (1984) are also examined. The Goodness-of-Fit has a value of .942 and the Adjusted Goodness-of-Fit Index has a value of .920; the root mean square residuals is .047. Hoelter's Critical N was also examined, and it has

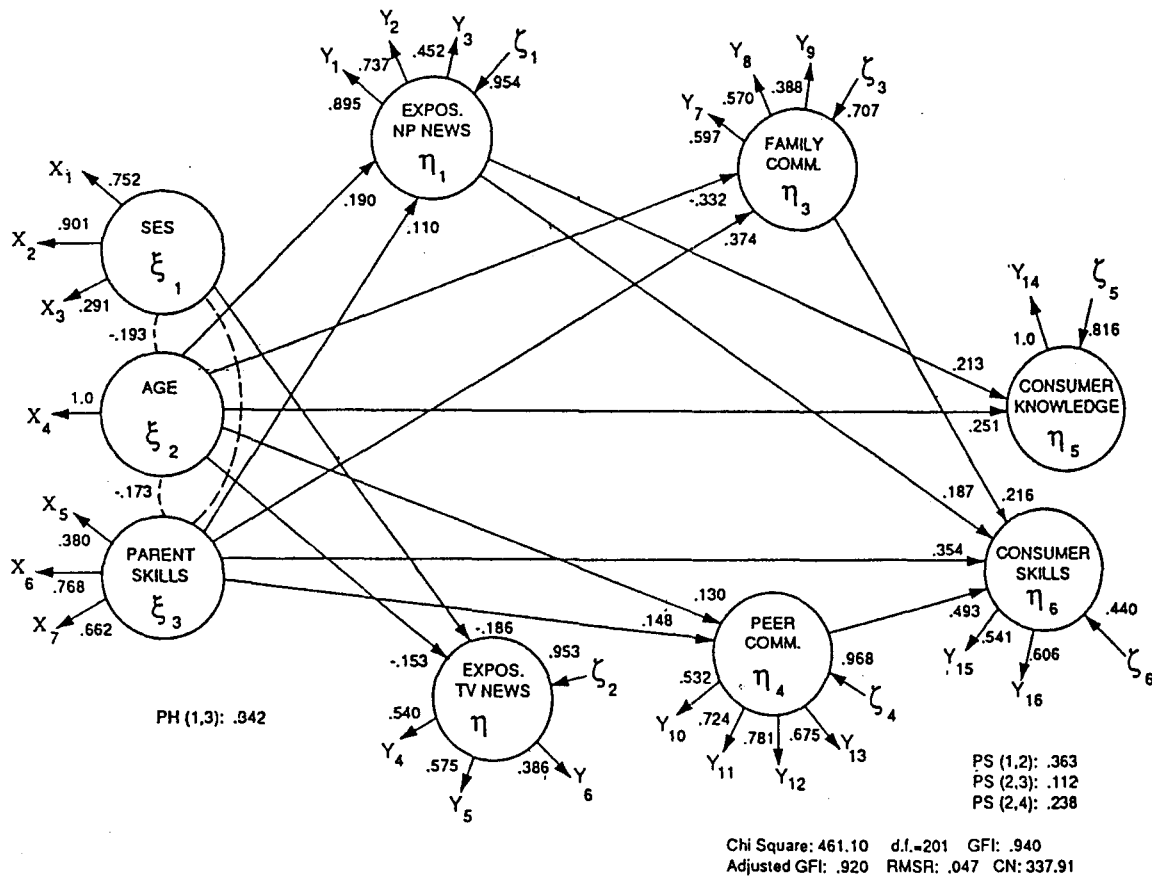


Figure 2: Results from the Social Learning Model (Standardized Solutions)

a value of 337.91. The total coefficient of determination for structural equations is 0.547. Approximately 18 per cent of the variance in consumer knowledge and 56 per cent of the variance in the teenage consumer's skills have been accounted for by this model.

Hypothesis one and two are largely supported. In line with the hypotheses, frequent communication with parents on consumption related matters was found to lead to better consumer skills in teenage consumers (beta = .216). Frequent communication with peers showed an even stronger effect on the learning of consumer skills (beta = .493). Hypothesis three concerning the impact of mass media is partly supported. Exposure to newspaper news contributed positively to the learning of both consumer knowledge (beta = .238) and of consumer skills (beta = .187) among the Taipei youths. However, exposure to informational content on television failed to show any discernable impact on either consumer knowledge or consumer skills.

Hypothesis four is also supported. The perceived parents' consumer skills showed a significant effect on their children's consumer skills (gamma = .354). Communication with parents on buying things occurred often when the adolescents perceived their parents to be wise consumers (gamma = .374). In addition, perceived pa-

rents' consumer skills also led to frequent interaction between the youths and their peers on consumption related matters ($\gamma = .148$).

In a sense, the perceived parents' consumer skills had both a direct ($\gamma = .354$) and an indirect effects on the Taipei Youths' learning of consumer skills. The indirect effect went through interpersonal communication—communication with parents ($\gamma = .374$) and with peers ($\gamma = .148$)—to affect teenage consumer skills ($\beta = .216, .493$). In other words, when parents were perceived as wise consumers, their children were more likely to discuss consumption-related matters with them and to look at them as role models on consumption related matters. As a result, these children had a better chance of learning to be wise consumers.

Inconsistent with early findings, hypothesis five is not supported. Socioeconomic level per se showed no direct effect on either teenagers' consumer knowledge and or their consumer skills, but it was negatively related to TV news exposure ($\gamma = -.186$).

Hypothesis six is largely supported. Age was found to lead to greater consumer knowledge ($\gamma = .251$) but showed no direct effect on consumer skills in the adolescents. However, age seemed to work through media exposure and interpersonal communication to indirectly influence consumer skills. Compared with SES, age was found to be a more prominent antecedent factor which affected the frequencies of exposing to news media as well as of interaction with family members and peers. Older adolescents were found to discuss consumption related matters with parents less frequently compared with younger adolescents ($\gamma = -.332$). Meanwhile, there was a tendency for teenagers to talk with peers on consumption matters more frequently as they grew older ($\gamma = .130$). These developmental changes in child-parent communication and child-peer communication on consumption-related topics are consistent with previous research findings (Kuo, 1987). Age was found to be positively associated with newspaper reading ($\gamma = .218$) but negatively related to TV viewing ($\gamma = -.171$).

Hypothesis seven deals with the inter-relationships among the four social learning processes, is partly supported. Exposure to television news is positively associated with exposure to newspaper ($\psi = .363$), but has no relation with how often teenagers talked about consumption-related matters with friends or with parents. On the other hand, exposure to newspapers was found to positively relate to frequency of communication with parents ($\psi = .112$) and with peers ($\psi = .238$) on consumption matters.

The three exogenous variables are also related to one another. Age is negatively associated with both SES ($\phi = -.193$) and with perceived parents' consumer skills ($\phi = -.173$). The latter two, however are positively correlated ($\phi = .342$).

Model 2: The Integrated Model

In order to compare the explanatory ability of the two theoretical models, one needs to control the central theoretical factors in the same context. An integrated

Results from Model 2

The results from the second model is presented in Figure 4. Only the parameters which are significant at .05 level are reported. This model also has a good-fit fit to the data, as indicated by the various indices. The Chi square value is 645 with 261 degrees of freedom. The Chi square ratio is 2.47. The Goodness-of-fit index has a value of .934 and the Adjusted Goodness-of-fit has a value of .913. The root mean square residuals is .047. The Critical N has a value of 331.03. Approximately 19 per cent of the variance in consumer knowledge and 56 per cent of the variance in consumer skills have been accounted for by the entire model.

The inclusion of the family communication pattern to the causal model did not change most of the structural relationships observed in the first model. The only differences are as follows: (1) The concept-oriented family communication pattern took away a slight portion of the causal effect that was attributed to the perceived parents' consumer skills in the first model. (2) Perceived parents' consumer skills showed a positive effect on newspaper news exposure ($\gamma = .110$) and on interaction with peers ($\gamma = .148$) in the first model, however, these causal paths

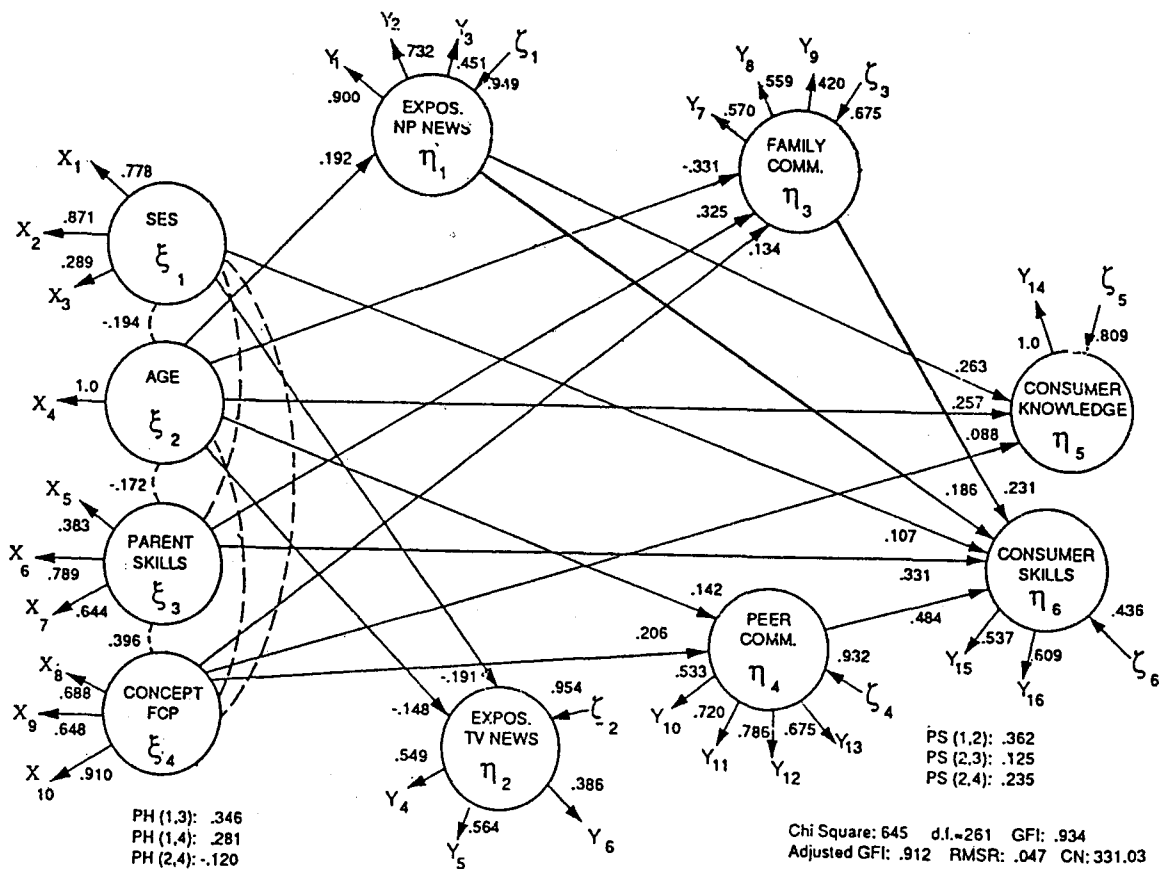


Figure 4: Results from the Integrated Model (Standardized Solutions)

become insignificant in the presence of the family communication environment. All the other parameter estimates, both measurement and structural parts, remain very stable.

Hypothesis eight which deals with the impact of family communication environment on the learning of consumer knowledge and skills is partly supported. A concept-oriented family communication pattern showed a moderate effect on the learning of knowledge about consumer affairs ($\gamma = .088$) but it failed to exhibit a direct effect on consumer skills. Hypothesis nine is supported. Concept-oriented family communication pattern was found to enhance interactions with both peers ($\gamma = .206$) and parents ($\gamma = .134$). In a sense, the concept-oriented family communication pattern did not directly affect the socialization outcomes. Rather, it worked its way through interpersonal communication on consumption matters to affect the learning of consumer skills.

Comparing the two models, the social learning approach seemed to be more powerful than the family communication pattern approach in accounting for the learning of consumer knowledge and skills in the Chinese youths. The social learning model alone was able to explain 56 per cent of the variance in the outcome variable and 18 per cent of the variance in consumer knowledge. When the construct of the concept-oriented family communication pattern was added to the combined model, the percentage of the explained variance in the two outcome variables did not increase significantly. This findings replicate the results from a similar study on American youths (Kuo, 1987). However, the addition of the family communication pattern construct to the model contributed substantially in accounting for the variances in two social learning processes— interaction with parents (Eta 3) and interaction with peers (Eta 4).

CONCLUSION

In this study, two theoretical approaches were adopted and integrated to examine the acquisition of consumer knowledge and skills in the Chinese teen-age consumers. A versatile multiple-indicator causal modeling approach—Linear Structural Relationship (LISREL) covariance analysis—was used in testing the hypotheses in a complex context, in which the competing explanatory factors were controlled.

It is believed that the two theories actually work hand in hand in explaining the socialization outcome. The contribution of this study lies in the fact that it brings together different theoretical perspectives and tries to integrate them in one single model with a view to presenting a more holistic picture of how teenagers learn to be smart consumers. Results from the analyses have provided some tentative answers to the research questions raised in this study.

Consistent with previous research findings, communication with parents and

peers on consumption matters and newspaper reading were associated with better consumer skills (Kuo, 1987; Moschis & Moore, 1978). Parents seemed to serve as role models for the teenage consumers. In addition, peer-child communication also contributed positively to the learning of consumer skills. In other words, it seems that the more frequently adolescents talked with others, be they parents or peers, the better consumer skills they learned. By including a perceptual variable of parents' consumer skills, the author fills in the missing link between perceiving parents as role models and actual discussing consumption related matters with parents. In comparing the two different theoretical approaches, it was found that the social learning approach was the more powerful one in explaining the learning of consumer knowledge and skills.

Previous studies found that age had a significant influence on teenage consumer skills. But results from this study tended to modify the previous finding—age per se had no direct impact on teenage consumer skills at all, rather, it worked through a process of communication with and learning from parents and friends. In other words, older adolescents are not necessarily smarter consumers than younger adolescents, they need to go through the process of social learning from reference groups, and from mass media in order to acquire such desirable and intelligent consumer skills.

Interesting findings regarding the structural relationships between the two theoretical approaches are observed: the concept-oriented communication pattern at home was found to encourage communication with both parents and peers on consumption matters. Since these two models involve communication at varying levels, they need to be integrated and investigated together.

Of course, there are some caveates that should be mentioned:

(1) Perceptual measures were used in measuring the construct of parents' consumer skills. There may be a problem of inaccuracy in perceptions. But the measurement item for parents' consumer skill asked the children to report their parents' behavior instead of attitudes and beliefs. Therefore, serious perceptual inaccuracy should not be expected because the questions dealt with overt and specific behaviors. The author was quite aware that subjective biases may result in a certain level of discrepancy between the perceived parents' orientations and the actual parents' orientations. It may be argued that it was the perception of reality that influenced the youngsters' cognition, attitude, and behavior. In other words, social reality lies in what gets perceived rather than in what is actually there.

(2) A non-probability sample of 712 Chinese youths from Taipei may not yield generalizable results to represent the consumer behaviors of all Chinese youths. This is a question of the external validity of the study which can always be questioned with most studies which did not use a nationally representative sample. And this question will remain unsolved until future replications of the results are available. Nevertheless, the author has a firm belief in the internal validity of the study.

What have been found in this study are largely in consistency with the findings from previous studies based on American youth samples.

Finally, this study is a fruitful one in spite of its flaws. A substantially high portion of the variances in the two outcome variables have been accounted for by the models. Besides, the study explored some untouched issues and will shed some light for researchers interested in conducting research in this area. With the versatile LISREL technique, an attempt was made to present a more holistic picture of what has been going on as teenagers learn to be normative consumers. Results from this study may provide a valid representation of reality.

Assuming the role of an intelligent consumer requires the ability to search for information and to use relevant information to attain the goal of maximizing consumer satisfaction. Being a smart consumer is not an inborn characteristic. A child's consumer skills do not improve automatically as he or she grows older, rather, it requires learning and education. Results from this study will certainly help consumer educators understand how young people develop consumption related skills, attitudes, and behaviors.

Moreover, findings from this study have also demonstrated that the two theoretical models—a social learning model and a family communication pattern model—can be integrated in future studies of other adolescent socialization issues. With this integrated-model approach, we may be able to get some insights into how mass media communication and interpersonal communication work jointly in affecting the socialization outcomes.

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