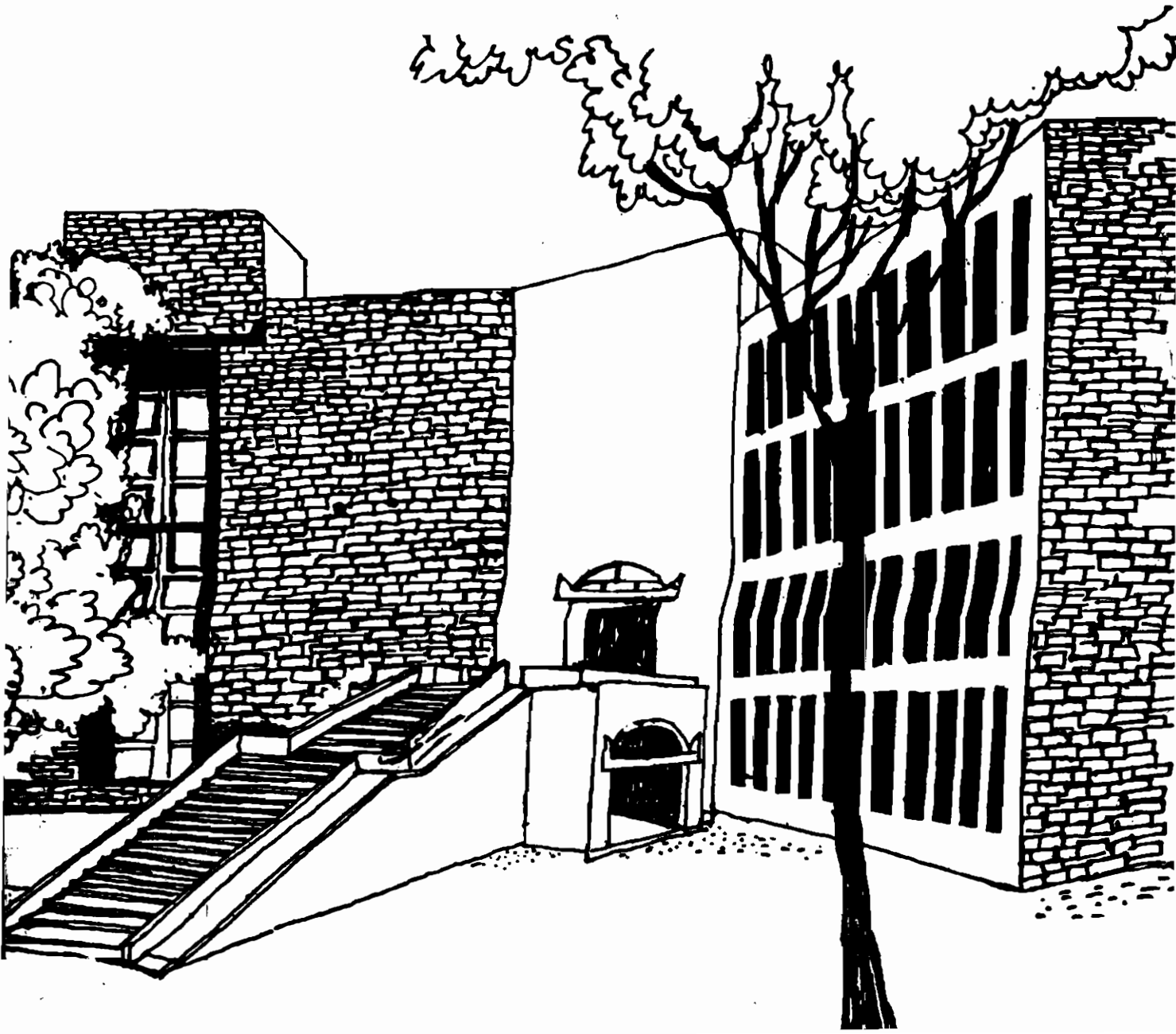




Working Paper



**INVESTMENT PATTERN AND DECISION MAKING:
THE ROLE OF WORKING WOMEN**

By

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**INVESTMENT PATTERN AND DECISION MAKING:
THE ROLE OF WORKING WOMEN**

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Abstract

An attempt is made to study how far working women enjoy freedom to take investment related decisions on their own and the patterns of investments in the male dominated investment world in India.

The questions related to investment pattern and its decision maker with respect to working women was studied by taking, 227 respondents from 3 cities: 108 in Ahmedabad, 60 in Solapur, 59 in Gulbarga. Questionnaire method was administered and data were collected on saving, types of investment, influencers, expenditure and decision-makers. In order to answer the questions, conventional and non-conventional statistics were used.

There is no significant difference among the respondents across the cities with respect to age, family size, type of family, marital status, level of education, occupation and annual income. No cultural and demographical patterns are associated with decision making of working women.

INVESTMENT PATTERN AND DECISION MAKING: THE ROLE OF WORKING WOMEN

Traditionally Indian women were confined to the family upbringing and laborers job. But in today's social settings of the nation, women have proved that they can match with abilities of the males in undertaking all kinds of jobs. The traditional concept of women being bondage to the household of child bearing, child rearing and domestic miscellany is now gradually changed. The process of emancipation from age-old male domination in woman's life and social restrictions imposed on her from time to time while elevating her from domestic chores has been totally improved. Male domination still persists to haunt the woman's life from both inside and outside the home. Due to the family system, traditional bonds, beliefs, working women are not fully empowered to take certain decisions on their own in general and some area like investment decisions, in particular. It is the persistent feeling in the society that investment related decisions of working women are greatly influence by non-investment related factors and male members.

A large number of studies have been conducted in relation to women autonomy or power structure in family with respect to fertility, schooling, decision making, empowerment etc. Some of the important studies conducted by researcher in the past, distinguished the decision making structure between housewives and working women in general like David (1958), Holfman et al (1974), Lalitha Devi (1982), Chauhan (1986), Tripathi and Arya (1994), and Pattnaik (1996), Bruce Caldwell (1996) have studied. The other group investigated on decision making issues related to financial decision matters, like Merrill Lynch (1979), Reddy (1986), Ramu (1989), Vidya Rani (1990), Muthuchidambaram (1992), Blank (1997), and Schieber (1999). The third set of studies analyzed about the influences on the female decision making in general activities like schooling, fertility, kinship relationship, selection of life partners, and finance namely, Singh (1998), Mazimiliane Szinovacz (1975), Meena and Lynn (1982), Jeffery et al (1996), Visaria (1996), Carol Vlassoff (1996), Rickson and Daniel (1999)

The existing studies concentrated on decision making on general aspects and paid less attention on investment related matters. The studies, which focussed on the determinants of decision making, are very few with respect to Indian context.

In this context an attempt is made to study how far working women enjoy freedom to take investment related decisions on their own and the patterns of investments in the male dominated investment world in India.

The study has attempted to address itself to the following questions:

1. What is the proportion of savings to the family income?
2. Are working women making joint decisions or independent decision in family related expenditure in relation to type of family?
3. Are women aware about various investment instruments?
4. Whether the working women invest their money on unproductive assets?
5. Are women prone to avoid risk?
6. Whether working women are paying attention on the new investment instruments? and
7. Who are the influencers while she is taking decision in matters realting to investment?

The above questions related to investment pattern and its decision maker with respect to working women was studied by taking, 227 respondents from 3 cities: 108 in Ahmedabad, 60 in Solapur, 59 in Gulbarga. Questionnaire method was administered and data were collected on saving, types of investment, influencers, expenditure and decision-makers. In order to answer the questions, conventional and non-conventional statistics were used.

The summary of demograhic details of respondents in the three cities s given in Table 1. Most of the respondents selected for the study belonged to the age group of 35 to 45 yeas and above 46 years of age across the cities. The family size of working women was on an average four to five person in a nuclear family, while in joint family, family size was on an average five to nine members. Marital status of the respondents across the cities was between 70-85 per cent were married, 15-30 per cent was unmarried and the rest were

widows. In educational level, 55-61 per cent of respondents were postgraduates and Ph.D and 16-38 per cent were graduates, while the rest were either diploma holders or less than the plus two. Occupation of the respondents in the selected cities are, 36-49 per cent teaching profession, 19-24 per cent managerial level, 4-22 per cent were professionals and 5-12 per cent were in the other fields.

The average annual income of the respondents in three cities was in the range of above Rs.1 lakh in Ahmedabad and Solapur and from Rs.0.75 lakh to Rs.1 lakh in Gulbarga. The average annual family income was more than Rs.4 lakh in Ahmedabad and Solapur, whereas it was Rs.3 lakh in Gulbarga. See Table 2.

It is witnessed from the savings behaviour of working women that in all three cities working women are having savings but the proportion of savings across the cities as well as within cities are different. In Ahmedabad and Solapur about 75 per cent of the respondents' saving proportion to the family income was above 11 per cent. On the other hand, in Gulbarga, about 52.54 per cent of respondents saving proportion was in the category between less than 5 per cent and 6 per cent to 10 per cent.

TABLE 3: The table shows family expenditure and its decision maker by type of family.

In joint family, independent decision are taken by her in relation to family expenditure on schoolfees(2.68),gifts (2.79), groceries (3.05), vegetables (2.53), bills (2.85), clothes (2.47) in Gulbarga.

In case of nuclear family, independent decision are taken for family expenditure by her in expenditure like vegetables and bills (2.5,2.78 respectively) in Ahmedabad. In Solapur gifts (2.47), groceries (2.78), vegetables (2.66), bills (2.69) and in Gulbarga gifts (2.71), groceries (2.92), vegetables (2.87) and bills (2.85).

In all other family expenditure decisions were taken by both of them across the cities.

The awareness level on various investment instruments of working women indicates a interesting scenerio. The level of awareness in relation to investment in securities (shares, bonds, and debentures) was witnessed highest in Gulbarga city between 53-75 per cent and it was lowest in Solapur with 37-58 per cent. In case of LIC, 93 per cent awareness was found in Solapur compared to 88 per cent and 60 per cent in Gulbarga and Ahmedabad respectively. With respect to bank saving schemes, Solapur working women had high level of awareness with respect to fixed deposits (42 per cent) and recurring deposits (77 per cent). The awareness in respect to Public Provident Fund was high in Ahmedabad with 85 per cent and lowest in Gulbarga with 52 per cent. Awareness in case of postal saving schemes, highest awareness was found in NSC in Solapur respondents. In other postal saving schemes, the awareness between 27-43 per cent in all the three cities.

The Cochran Q test is used for nominal data or forced choice (Yes/No). To test the null hypotheseis (H_0) that working women responses on "yes" is same between various investmetn instruments and three cities respondents "yes" responses tested individually. The results indicates the calculated value of Q (Ahmedabad-319.10, Solapur-1354.70, Gulbarga-1183.31) is greater than the table value, chi square table, right tail value, thus Q is significant and the null hypothesis is not accepted. Therefore, it is concluded that the respondents "yes" response on awareness level on various investment instruments are different in three cities respectively. See Table 4.

Table 5 presents details on the working women opinion on various sources which provide information to them on various investment instruments.

In Solapur, the source of information for the respondents varied from investment to investment. However, Agents played a crucial role in giving significant information in relation to LIC scheme (74 per cent), UTI (50 per cent), NSC (47 per cent) and postal recurring deposits (41 per cent). The source of information regarding shares was friends

(31 per cent) and newspapers (23 per cent). Bank played as an instrumental role by providing information regarding fixed deposits (59 per cent). Most of the respondents were aware of postal saving scheme.

The details on source of information for Ahmedabad indicates - agents in relation to following investment LIC (48 per cent), NSC (30 per cent) and IVP (16 per cent). Newspaper played an important role of funding information regarding securities 12-25 per cent. Friends advised on PPF 21 per cent. Bank gave information on its fixed deposits (58 per cent) and recurring deposits (25 per cent).

In Gulbarga city, the respondents source of information for their investments was agents in LIC with 32 per cent and UTI with 23 per cent. Newspapers provided information about securities to the extent of 15-23 per cent. Bank played an important role in its fixed deposits with 50 per cent and recurring deposit with 37 per cent.

From present investment pattern, the investment in securities across the cities was maximum between 20-57 per cent. LIC is highest at 93 per cent in Solapur respondents. In case of bank savings, Ahmedabad respondents savings in PPF was 87 per cent, while Solapur respondents were highly investing in fixed deposit with 88 per cent and recurring deposits with 70 per cent. In case of postal savings, Solapur had highest investment of 68 per cent and lowest of 41 per cent from Gulbarga. In all others saving schemes, like IVP, KVP, recurring deposits, postal savings account, term deposits investment were low, the range of investment pattern was between 6-38 per cent.

On an average in all type of investment instruments namely, securities (39.47), LIC (92.85), bank saving schemes (75.85) and postal savings schemes (32.25), Solapur respondents invested their savings comparatively higher than the respondents of Ahmedabad and Gulbarga.

The Cochran Q test is used for nominal data or forced choice (Yes/No). The results

indicates the calculated value of Q (Ahmedabad-843.41, Solapur-633.13, Gulbarga-351.22) is greater than the table value, thus Q is significant and the null hypothesis is not accepted. Therefore, it is concluded that the respondents "yes" response on the present level on various investment instruments are different in three cities.

The details on classification of respondents (see Table 7) by savings or investments in personal items like gold, land and household articles and other types shows that, out of 108 respondents in Ahmedabad 50 (46.30 per cent) respondents invested in gold, 37 out of 108 had invested in land and of 108, 49 respondents invested in household items like TV, refrigerators, washing machines, micro-oven, etc. In Solapur, out of 60 respondents, 29 invested in gold, 18 of 60 respondents invested in land as majority of the respondents owned houses and of 60, 29 invested in household items. In Gulbarga, 59 respondents surveyed, of which 51 respondents form of investment is gold, followed by 42 of 59 invested in household items and only 10 out of 59 respondents invested in land. It is observed that majority of the respondents owned houses, so investing for land purpose was less.

The null hypothesis on the three cities (individually), working women opinion on "yes" with respect to investment on personal items is tested with Cochran Q test. The calculated value of Q (Ahmedabad-198.70, Solapur-99.89, Gulbarga-170.86) is greater than the table value, thus Q is significant and the null hypothesis is not accepted. Therefore, it is concluded that the respondents "yes" response on personal saving like gold, land, household articles is different in three cities. (Chi square table (right tail) is referred for testing the significance level for calculated value).

Organizational investment pattern of working women (Table 8) with respect to Provident Fund and Group Insurance Scheme indicates that organisation does provide provident fund facilities for its employees in Ahmedabad with 70.37 per cent, followed by 29.63 per cent in Solapur and a very low per cent of 11.86 was observed in Gulbarga. In case of Group Insurance Scheme, maximum of 60.00 per cent in Solapur, 57.41 per cent in

Ahmedabad, and in Gulbarga the percentage indeed very low (6.78 per cent). The organisation did take care of the employee welfare measures by investing certain amount in provident fund and group insurance schemes and pension scheme in cities like Ahmedabad and Solapur.

The calculated value of Q (Ahmedabad-116.72, Solapur-115.61, Gulbarga-9.90) is greater than the table value, thus Q is significant and the null hypothesis is not accepted. Therefore, it is concluded that the respondents "yes" response on organisational investment pattern are different in three cities.

Across the cities, majority of the working women (more than 90 per cent) agreed on returns from their investment. With respect to the security for their money, there was 100 per cent acceptance from the respondents of Solapur and 97.28 per cent in Ahmedabad and 86.44 per cent in Gulbarga. While making investment decisions, around 50 per cent of working women were found to be aversive to risks in all three cities. It was also found that more than 85 per cent of working women agreed that they were investing their savings for tax exemptions. Maximum percentage of working women were investing their saving for their children welfare and for their future.

ANOVA is applied to test the hypothesis with respect to working women opinion on critical factors on investment decision making that is; Working women opinion on influence matters of investment decision making are same between the cities.

The calculated F value of respondents opinion with respect to influence matters on investment decision making at 5 per cent level of significance, the null hypothesis is not accepted and alternative hypothesis is accepted. Therefore, it is concluded that working women opinion with respect to critical factors influence matters on investment decision making are different between three cities.

It is found that the announcement of high multiple option bonds, 50 per cent paid attention from Ahmedabad and Solapur, but only 22 per cent from Gulbarga of sample surveyed.

Those who paid attention and invested are Ahmedabad with 48 per cent, Solapur 43 per cent and Gulbarga with 38 per cent.

It is noticed from the announcement related to launching of mutual fund by UTI/LIC/GIC that out of 108 respondents survey in Ahmedabad, 68 respondents (62.96 per cent) paid attention and of which 54.41 per cent invested their savings. In case of Solapur, 60 respondents surveyed, 40 respondents paid attention of which 66.67 per cent made investment and in Gulbarga, 19 paid attention on this announcement. Out of 19, 32 per cent of respondents only invested their savings.

It is found from the announcement related to launching of tax-free bonds, out of 108 respondents survey in Ahmedabad, 73 respondents (67.59 per cent) paid attention and of which 67.12 per cent invested in it. In case of Solapur, 60 respondents surveyed, 34 respondents paid attention of which 55.88 per cent made investment and in Gulbarga, 18 paid attention on this announcement. Out of 18, 66.67 per cent of respondents only invested their savings.

In case of high risk/ higher return bonds/ investment scheme, out of 108 respondent's survey in Ahmedabad, 28 respondents (25.93 per cent) paid attention and of which 50 per cent invested their savings. In case of Solapur, 60 respondents surveyed, 20 respondents paid attention of which 60 per cent made investment and in Gulbarga, 12 paid attention on this announcement. Out of 12, 66.67 per cent of respondents only invested their savings.

As the calculated value of Q (Ahmedabad - 587.18, Solapur - 326.43, Gulbarga - 880.92) is greater than the table value of chi square, Q is significant and null hypotheses is not accepted. Therefore, it is concluded that the respondents "yes" response on the four announcement is not same.

The respondents opinion on influence on the investment related matters with respect to amount, time, and type of investments is given in Table 11. In relation to amount it is seen that the working women (Ahmedabad=2.31, Solapur=2.55, Gulbarga=2.22) themselves

are taking decision, followed by some influence of husband and investment company across the three cities.

When it comes to time of investment, it is herself, (Ahmedabad=2.22, Solapur=2.5, Gulbarga=2.22) followed by somewhat influence of husband in all the three cities. Friend influence somewhat in city of Gulbarga to the respondents, while in Ahmedabad and Solapur it is the investment companies who influence her to some extent.

For the type of investment, it is herself (2.51), in Solapur and Gulbarga (2.22). On the other hand Husband (2.21) influences her for the type of investment in Ahmedabad.

Friends influence her somewhat in Solapur and the investment companies influence her somewhat in Ahmedabad and Gulbarga.

CONCLUSION

There is no significant difference among the respondents across the cities with respect to age, family size, type of family, marital status, level of education, occupation and annual income. No cultural and demographical patterns are associated with decision making of working women. In joint family, especially in Gulbarga independent decision regarding family expenditure were in school fees, gifts, groceries, vegetables and bills while other decisions were taken by both. In nuclear family, working women takes independent decisions in the household related activities like buying, school fees, gifts, groceries, vegetables and clothes. The joint decision making was made like, rent, vacations, and servants. There is no significant percentage savings difference across the cities. This confirmed our assumptions that working women across the cities are investing their saving in one form or other. Across the cities, higher awareness levels of working women on various types of investments were noticed. Among type of investment, high level of awareness was in LIC, Bank and Postal related investments. Moderate level of awareness was also noticed in shares, bonds and debentures. In creating awareness about various types of investments, Agents played a crucial role followed by newspapers and friends. Most of the working women invested in securities, LIC and bank in the past and present

situations. In personal items related investment, higher preference was observed to gold compared to other items like land and household articles and the high level of percentage was noticed in Gulbarga than other two cities. The organisation does play a significant role in investment patterns of working women in case of Ahmedabad and Solapur, but it was very low in Gulbarga. While making investment decisions, working women were found to be aversive to risks. In relation to announcement made by the investment company, moderate eagerness with a desire to investment was noticed in Ahmedabad and Solapur. In relation to amount, time and type of investment, working women were mainly decision-makers themselves. Others who influenced the decision making process were husband and friends followed by in-laws. Investment companies also played a crucial role by sharing information-providing avenues to the investors.

The study has wide scope for future research. The study has scope for increasing women's empowerment and giving inputs of investments. The other area for the research are: Awareness programme in organisation dealing with investment. Role of NGO's in giving some inputs on saving to working women. Cross sectional studies can be carried out in the area of - (a) self employed; (b) professional; (c) salaried employees.

**TABLE 1: A SUMMARY OF DEMOGRAPHIC DETAILS OF RESPONDENTS
IN THE STUDY AREA**

DETAILS	AHMEDABAD	SOLAPUR	GULBARGA
Age			
18-25	6 (5.56)	1 (1.67)	11 (18.64)
26-34	24 (22.22)	14 (23.33)	18 (30.51)
35-45	49 (45.37)	28 (46.67)	20 (33.90)
46 and above	29 (26.85)	17 (28.33)	10 (16.95)
Average Family Size	4.185	5.37	5.40
Family Type			
Joint	39 (36.11)	28 (46.67)	20 (33.90)
Nuclear	69 (63.89)	32 (53.33)	39 (66.10)
Marital Status			
Married	88 (81.48)	51 (85.00)	41 (69.49)
Unmarried	20 (18.52)	4 (6.67)	16 (27.12)
Widow	0 (0.00)	5 (8.33)	2 (3.39)
Education Level			
Ph.D	17 (15.74)	2 (3.33)	2 (3.39)
Post- Graduate	42 (38.89)	32 (53.33)	34 (57.63)
Graduate	41 (37.96)	10 (16.67)	20 (33.90)
Diploma	3 (2.78)	12 (20.00)	0 (0.00)
Plus 2 And Less	5 (4.63)	4 (6.67)	3 (5.08)
Occupation			
Academics	45 (41.67)	22 (36.67)	29 (49.15)
Professionals	5 (4.63)	13 (21.67)	9 (15.25)
Managerial	21 (19.44)	13 (21.67)	14 (23.73)
Technical	5 (4.63)	3 (5.00)	1 (1.70)
Others	32 (29.63)	9 (15.00)	6 (10.17)
Annual Income of Respondent			
Less than 25000	0 (0.00)	3 (5.00)	1 (1.69)
25001 - 50000	4 (3.70)	1 (1.67)	1 (1.69)
50001 - 75000	14 (12.96)	4 (4.67)	14 (23.73)
75001 - 100000	14 (12.96)	9 (15.00)	11 (18.64)
Above 100001	76 (70.37)	43 (71.67)	32 (54.24)
Average Annual Family Income of Respondent	3.41	2.83	3.66

Source: Field Survey

Figures in parentheses are percentage

TABLE 2: INFORMATION OF RESPONDENTS SAVINGS TO THE PROPORTION TO FAMILY INCOME

SAVINGS	AHMEDABAD	SOLAPUR	GULBARGA
Less Than 5%	8 (7.41)	6 (10.00)	14 (23.73)
6%TO10%	20 (18.52)	9 (15.00)	17 (28.81)
11%TO15%	16 (14.81)	7 (11.67)	7 (11.86)
16%TO20%	19 (17.59)	11 (18.33)	7 (11.86)
21%TO25%	24 (22.22)	11 (18.33)	6 (10.17)
Above 26%	21 (19.44)	16 (26.67)	8 (13.56)
Total	108 (100.00)	60 (100.00)	59 (100.00)

Source: Field Survey

Figures in parentheses are percentage

TABLE 3: FAMILY EXPENDITURE AND ITS DECISION MAKER BY TYPE OF FAMILY

EXPENDITURE	AHMEDABAD				SOLAPUR				GULBARGA			
	JOINT		NUCLEAR		JOINT		NUCLEAR		JOINT		NUCLEAR	
	MEAN	SD	MEAN	SD	MEAN	SD	MEAN	SD	MEAN	SD	MEAN	SD
School Fees	1.51	1.21	1.64	1.31	1.86	1.24	2.06	1.32	2.68	1.67	2.38	1.81
Gifts	2.14	0.93	2.09	0.72	2.19	0.72	2.47	0.40	2.79	0.79	2.71	0.98
Rent	0.97	1.37	0.94	1.34	0.96	1.48	0.93	1.40	1.75	1.65	1.49	1.65
Groceries	2.19	1.10	2.47	0.72	2.27	0.98	2.78	0.92	3.05	0.78	2.92	0.90
Vegetables	2	0.94	2.5	0.80	2.28	0.82	2.66	0.68	2.53	1.12	2.87	0.83
Bills	2.32	1.18	2.78	0.97	2.65	0.99	2.69	1.06	2.85	1.22	2.85	0.93
Clothes	2.2	0.90	2.43	0.76	2.38	0.53	2.29	0.64	2.47	0.61	2.41	0.68
Vacation	1.95	1.10	2.10	1.04	2.04	1.12	2.06	1.26	2.3	1.03	2.28	0.99
Servants	2.18	1.09	2.31	0.96	2.08	1.31	2.03	1.09	1.9	1.62	2.08	1.63
Others	1.42	1.36	1.12	1.32	1.43	1.44	1.09	1.43	0.7	1.12	1.03	1.46

Source: Author's Calculation

TABLE 4: REACTION(S) OF THE RESPONDENTS ON THE INVESTMENT INSTRUMENTS REGARDING AWARENESS

AWARENESS	AHMEDABAD		SOLAPUR		SOLAPUR	
	Yes	No	Yes	No	Yes	No
Shares	64.81	35.19	46.67	53.33	74.58	25.42
Bonds	57.41	42.59	40.00	60.00	62.71	37.29
Debentures	49.07	50.93	36.67	63.33	52.55	47.45
Unit Trust Of India	60.19	39.81	58.33	41.67	74.58	25.42
Life Insurance Corporation	86.11	13.89	93.33	6.67	88.14	11.86
Public Provident Fund	85.19	14.81	83.33	16.67	54.24	45.76
Bank-Recurring Deposit	49.07	50.93	76.67	23.33	49.15	50.85
Bank- Fixed Deposit	33.33	66.67	41.67	58.33	13.56	86.44
National Saving Certificate	76.85	23.15	83.33	16.67	55.93	44.07
Indira Vikas Patra	43.52	56.48	43.33	56.67	27.12	72.88
Kisan Vikas Patra	37.04	62.96	40.00	60.00	30.50	69.50
Post Office-R D	32.41	67.59	45.00	55.00	37.29	62.71
Post Office- Saving account	30.56	69.44	36.67	63.33	49.15	50.85
Post Office-Term Deposit	29.63	70.37	30.00	70.00	33.90	66.10
Others	12.04	87.96	3.33	96.67	6.78	93.22
Q Test	319.10*		1354.70*		1183.31*	

Source: Field Survey

* $X^2_{0.01, d.f 14} = 29.14$

TABLE 5 : REACTIONS OF THE RESPONDENTS ON THE SOURCE OF INFORMATION REGARDING INVESTMENT INSTRUMENTS IN AHMEDABAD

SOI	Shares	Bonds	Debenture	UTI	LIC	PPF	Bank - RD	Bank-FD	NSC	IVP	KVP	PO-RD	PO-SA	PO-TD	others
Agents Ahmedabad	5.71	11.29	9.62	26.15	47.83	22.83	18.87	2.78	30.12	19.15	15.38	13.89	14.71	15.63	8.33
Solapur	0.00	4.35	5.26	50.00	74.51	34.04	40.48	4.55	46.81	28.57	19.05	40.91	31.58	20.00	0.00
Gulbarga	0.00	2.78	0.00	23.26	32.00	9.38	3.70	12.50	6.06	6.25	0.00	4.55	0.00	10.00	0.00
Own Ahmedabad	14.29	11.29	11.54	12.31	11.96	18.48	20.75	22.22	22.89	17.02	25.64	27.78	29.41	31.25	50.00
Solapur	15.38	13.04	15.79	10.00	9.80	17.02	16.67	22.73	17.02	23.81	28.57	18.18	26.32	26.67	50.00
Gulbarga	17.07	16.67	19.35	4.65	8.00	25.00	18.52	12.50	30.30	25.00	23.53	36.36	50.00	30.00	25.00
News-paper Ahmedabad	20.00	19.35	25.00	12.31	9.78	7.61	5.66	2.78	8.43	17.02	17.95	13.89	17.65	15.63	8.33
Solapur	23.08	26.09	26.32	6.67	0.00	6.38	7.14	0.00	4.26	23.81	28.57	22.73	10.53	13.33	0.00
Gulbarga	14.63	19.44	22.58	18.60	4.00	21.88	14.81	0.00	18.18	37.50	29.41	13.64	11.54	10.00	0.00
Friend Ahmedabad	12.86	11.29	7.69	9.23	9.78	20.65	15.09	2.78	9.64	12.77	10.26	13.89	11.76	12.50	0.00
Solapur	30.77	17.39	15.79	3.33	3.92	14.89	9.52	9.09	6.38	9.52	4.76	0.00	10.53	13.33	0.00
Gulbarga	2.44	.56	12.90	13.95	16.00	9.38	0.00	12.50	12.12	6.25	23.53	9.09	19.23	5.00	50.00

Bank Ahmedabad	2.86	0.00	1.92	0.00	1.09	16.30	24.53	58.33	4.82	0.00	0.00	0.00	0.00	0.00	0.00	3.13	0.00
Solapur	3.85	0.00	0.00	0.00	0.00	10.64	11.90	59.09	2.13	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Gulbarga	0.00	0.00	0.00	0.00	0.00	3.13	37.04	50.00	6.06	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Media Ahmedabad	8.57	9.68	11.54	10.77	2.17	1.09	5.66	2.78	7.23	8.51	5.13	11.11	5.88	6.25	8.33	8.33	8.33
Solapur	0.00	4.35	5.26	0.00	0.00	2.13	2.38	0.00	4.26	4.76	4.76	0.00	0.00	0.00	0.00	0.00	0.00
Gulbarga	2.44	2.78	0.00	4.65	4.00	0.00	3.70	0.00	3.03	12.50	5.88	0.00	0.00	10.00	0.00	10.00	0.00
n,m,a,f, me, a Ahmedabad	4.29	4.84	3.85	4.62	3.26	3.26	3.77	2.78	3.61	4.26	7.69	5.56	5.88	6.25	8.33	8.33	8.33
Solapur	3.85	4.35	5.26	3.33	1.96	2.13	2.38	0.00	2.13	4.76	4.76	4.55	5.26	6.67	50.00	50.00	50.00
n,m,e Ahmedabad	8.57	11.29	7.69	7.69	3.26	1.09	1.89	0.00	2.41	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Solapur	0.00	4.35	5.26	0.00	0.00	0.00	0.00	4.55	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
n,a Ahmedabad	2.86	1.61	1.92	3.08	2.17	1.09	0.00	2.78	2.41	2.13	2.56	2.78	2.94	3.13	0.00	0.00	0.00
Solapur	3.85	4.35	0.00	13.33	3.92	4.26	2.38	0.00	8.51	4.76	4.76	4.55	5.26	6.67	0.00	0.00	0.00
Gulbarga	0.00	0.00	0.00	0.00	2.00	0.00	0.00	0.00	0.00	0.00	5.88	4.55	3.85	0.00	0.00	0.00	0.00

Magaz-line Ahmedabad	0.00	4.84	1.92	0.00	0.00	0.00	1.89	2.78	2.41	2.13	2.56	2.78	2.94	3.13	8.33
Solapur	7.69	8.70	10.53	0.00	0.00	2.13	2.38	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Gulbarga	7.69	8.70	10.53	0.00	0.00	2.13	2.38	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
n,ma,me,a Ahmedabad	1.43	1.61	1.92	1.54	2.17	2.17	1.89	0.00	0.00	2.13	2.56	2.78	2.94	0.00	0.00
n,ma,f Ahmedabad	2.86	4.84	5.77	1.54	0.00	1.09	0.00	0.00	1.20	2.13	0.00	0.00	0.00	0.00	0.00
Gulbarga	0.00	0.00	0.00	2.33	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Others Ahmedabad	15.71	8.06	9.62	10.77	6.52	4.35	0.00	0.00	4.82	12.77	10.26	5.56	5.88	0.00	8.33
Solapur	11.54	13.04	10.53	13.33	5.88	6.38	4.76	0.00	8.51	0.00	4.76	9.09	10.53	13.33	0.00
Gulbarga	53.66	50.00	38.71	30.23	26.00	25.00	22.22	12.50	21.21	12.50	11.76	22.73	11.54	35.00	25.00
TOTAL Ahmedabad	70	62	52	65	92	92	53	36	83	47	39	36	34	32	12
Solapur	26	23	20	30	52	47	43	24	47	23	22	23	20	15	4
Gulbarga	41	36	31	43	50	32	27	8	33	16	17	22	26	20	4

Note: (a) n,ma,f,me,a: newspaper, magazine, friend, media and agent; (b) n,me: newspaper, media (c) n,ma,me,a: newspaper, magazine, media and agent; (d) n,ma,f: newspaper, magazine, friend (e) n,a: newspaper, agent
Source: Field Survey

TABLE 6:REACTION(S) OF THE RESPONDENTS ON THE INVESTMENT INSTRUMENTS INVESTED AT PRESENT

INSTRUMENT INVESTED AT PRESENT	AHMEDABAD		SOLAPUR		GULBARGA	
	Yes	No	Yes	No	Yes	No
Shares	40.00	60.00	50.00	50.00	56.81	43.19
Bonds	35.48	64.52	29.16	78.84	29.73	70.27
Debentures	20.75	79.25	27.27	72.73	20.00	80.00
Unit Trust Of India	43.08	56.92	51.43	48.57	20.45	79.55
Life Insurance Corporation	81.72	18.28	92.85	7.15	73.08	26.92
Public Provident Fund	86.96	13.04	70.00	30.00	41.93	58.07
Bank-Recurring Deposit	45.28	52.83	69.56	30.44	51.72	48.28
Bank-Fixed Deposit	72.22	27.78	88.00	12.00	50.00	50.00
National Saving Certificate	60.24	39.76	68.00	32.00	40.63	59.37
Indira Vikas Patra	21.28	78.72	23.07	76.93	7.14	92.86
Kisan Vikas Patra	15.00	85.00	16.66	83.84	5.88	94.12
Post Office -Recurring Deposit	14.29	85.71	33.03	66.67	40.91	59.09
Post Office - Saving account	21.21	78.79	31.82	68.18	51.72	48.28
Post Office-Term Deposit	31.25	68.75	38.89	61.11	15.00	85.00
Others	92.30	7.70	100.00	0.00	50.00	50.00

TABLE 6:REACTION(S) OF THE RESPONDENTS ON THE INVESTMENT INSTRUMENTS INVESTED AT PRESENT

INSTRUMENT INVESTED AT PRESENT	AHMEDABAD		SOLAPUR		GULBARGA	
	Yes	No	Yes	No	Yes	No
Shares	40.00	60.00	50.00	50.00	56.81	43.19
Bonds	35.48	64.52	29.16	78.84	29.73	70.27
Debentures	20.75	79.25	27.27	72.73	20.00	80.00
Unit Trust Of India	43.08	56.92	51.43	48.57	20.45	79.55
Life Insurance Corporation	81.72	18.28	92.85	7.15	73.08	26.92
Public Provident Fund	86.96	13.04	70.00	30.00	41.93	58.07
Bank-Recurring Deposit	45.28	52.83	69.58	30.44	51.72	48.28
Bank- Fixed Deposit	72.22	27.78	88.00	12.00	50.00	50.00
National Saving Certificate	60.24	39.76	68.00	32.00	40.63	59.37
Indira Vikas Patra	21.28	78.72	23.07	76.93	7.14	92.86
Kisan Vikas Patra	15.00	85.00	16.66	83.34	5.88	94.12
Post Office -Recurring Deposit	14.29	85.71	33.03	66.67	40.91	59.09
Post Office - Saving account	21.21	78.79	31.82	68.18	51.72	48.28
Post Office-Term Deposit	31.25	68.75	38.89	61.11	15.00	85.00
Others	92.30	7.70	100.00	0.00	50.00	50.00
Q Test	843.41*		633.13*		351.22*	

Source: Field Survey

$X^2_{0.01,df,14}=29.14$

**TABLE 7: CLASSIFICATION OF RESPONDENTS BY SAVINGS IN
PERSONAL ITEMS**

PERSONAL ITEMS	AHMEDABAD		SOLAPUR		GULBARGA	
	Yes	No	Yes	No	Yes	No
Gold	50 (46.30)	58 (53.70)	29 (48.33)	31 (51.67)	51 (86.44)	8 (13.56)
Land	37 (34.26)	71 (65.74)	18 (30.00)	42 (70.00)	10 (16.95)	49 (83.05)
Household Article	49 (45.37)	59 (54.63)	29 (48.33)	31 (51.67)	42 (71.19)	17 (28.81)
Others	28 (25.93)	80 (74.07)	6 (10.00)	54 (90.00)	4 (6.78)	55 (93.22)
Q Test	170.86*		99.89*		198.70*	

Source: Field Survey

* $\chi^2_{0.01,df3}=11.34$

TABLE 8: CLASSIFICATION OF RESPONDENTS BY ORGANIZATIONAL INVESTMENT PATTERN

ORGANISATIONAL INVESTMENT PATTERN	AHMEDABAD		SOLAPUR		GULBARGA	
	Yes	No	Yes	No	Yes	No
Provident Fund	76 (70.37)	32 (29.63)	40 (66.67)	20 (33.33)	7 (11.86)	52 (88.14)
G.I.S.	62 (57.41)	46 (42.59)	36 (60.00)	24 (40.00)	4 (6.78)	55 (93.22)
Others	10 (9.26)	98 (90.74)	6 (10.00)	54 (90.00)	6 (10.17)	53 (89.83)
Q Test	116.72*		115.61*		9.90*	

Source: Field Survey

Figures in parentheses are percentage

$$X^2_{0.01,df 2}=9.21$$

TABLE 9.1: ANOVA RESULTS ON WORKING WOMEN OPINION ON CRITICAL FACTORS INFLUENCES INVESTMENT DECISION MAKING

Statements	F-calculated	F-critical value
I do consider return from investment	14.757	3.036
If I feel there is security for money, I will invest	13.515	3.036
I do take risk at certain time for investing money	7.286	3.036
I do invest to get tax exemption	21.275	3.036
I do invest for welfare of my children	16.111	3.036
I do invest for our future:	22.733	3.036

Source: Author's calculations

F-critical value is at 5 per cent significance level with d f v1=2 and v2=224

TABLE 9 (i) : CLASSIFICATION OF RESPONDENTS ON CRITICAL FACTORS INFLUENCE OF INVESTMENT DECISION MAKING IN AHMEDABAD AND SOLAPUR

OPINION	AHMEDABAD						SOLAPUR					
	S1	S2	S3	S4	S5	S6	S1	S2	S3	S4	S5	S5
Strongly Agree	46.30	55.56	2.78	47.22	46.30	60.19	41.67	53.33	8.33	35.00	51.67	51.67
Agree	43.52	38.89	24.07	47.22	30.56	32.41	55.00	41.67	21.67	48.33	33.33	43.33
Uncertain	9.26	2.78	25.93	2.78	5.56	4.63	1.67	5.00	21.67	10.00	5.00	3.33
Disagree	0.00	2.78	27.78	0.93	0.93	1.85	1.67	0.00	30.00	1.67	1.67	0.00
Strongly Disagree	0.93	0.00	19.44	0.93	0.93	0.93	0.00	0.00	18.33	3.33	1.67	1.67
No Comments	0.00	0.00	0.00	0.93	15.74	0.00	0.00	0.00	0.00	1.67	6.67	0.00

- Statement 1 : I do consider returns from my investments
Statement 2 : If I feel there is security for money, I will invest.
Statement 3 : I do take risk at certain time for investing money.
Statement 4 : I do invest to get tax exemption.
Statement 5 : I do invest for the welfare of my children.
Statement 6: I do invest for our future.

Source: Field Survey

TABLE 9(ii): CLASSIFICATION OF RESPONDENTS ON CRITICAL FACTORS INFLUENCE OF INVESTMENT DECISION MAKING IN GULBARGA

OPINION	GULBARGA					
	S1	S2	S3	S4	S5	S6
Strongly Agree	10.17	28.81	20.34	11.86	11.86	16.95
Agree	66.10	44.07	33.90	45.76	47.46	50.85
Uncertain	15.25	13.56	20.34	27.12	15.25	13.56
Disagree	6.78	13.56	8.47	11.86	15.25	13.56
Strongly Disagree	1.69	0.00	15.25	3.39	5.08	5.08
No Comments	0.00	0.00	1.69	0.00	5.08	0.00

Source: Field Survey

TABLE 10 (i): INFORMATION ON RESPONDENTS REACTION(S) TO INVESTMENT RELATED ANNOUCEMENT IN AHMEDABAD AND SOLAPUR

ANNOUCEMENT	AHMEDABAD				SOLAPUR			
	Paid attention		Paid attention with the desire to invest		Will pay attention		Paid attention with the desire to invest	
	YES	NO	YES	NO	YES	NO	YES	NO
1.High featured multiple options bonds	54 (50.00)	54 (50.00)	26 (48.15)	28 (51.85)	30 (50.00)	30 (50.00)	13 (43.33)	17 (56.67)
2.Launching of mutual funds by UTI/LIC/GIS	68 (62.96)	40 (37.04)	37 (54.41)	31 (45.59)	40 (66.67)	20 (33.33)	28 (70.00)	12 (30.00)
3.Launching of tax free bonds etc.	73 (67.59)	35 (32.41)	49 (67.12)	24 (32.88)	34 (56.67)	26 (43.33)	19 (55.88)	15 (44.12)
4.High risk/ higher return bonds/ investment scheme	28 (25.93)	80 (74.07)	14 (50.00)	14 (50.00)	20 (33.33)	40 (66.67)	12 (60.00)	8 (40.00)
Q Test	587.18*				326.43*			

TABLE 10 (ii): INFORMATION ON RESPONDENT S REACTION (S) TO INVESTMENT RELATED ANNOUCEMENT IN GULBARGA

ANNOUNCEMENT	GULBARGA			
	Will pay attention		Paid attention with the desire to invest	
	YES	NO	YES	NO
1.High featured multiple options bonds	13 (22.03)	46 (77.97)	5 (38.46)	8 (61.54)
2.Launching of mutual funds by UTI/LIC/GIS	19 (32.20)	40 (67.80)	13 (68.42)	6 (31.58)
3.Launching of tax free bonds etc.	18 (30.51)	41 (69.49)	12 (66.67)	6 (33.33)
4.High risk/ higher return bonds/ investment scheme	12 (20.34)	47 (79.66)	8 (66.67)	4 (33.33)
Q Test	880.92*			

Source: Field Survey

Figures in parentheses are

percentage

* $X^2_{0.01,d.f.3}=11.34$

TABLE.11: RESPONDENTS OPINION ON INFLUENCE ON MATTERS RELATED TO INVESTMENT IN RESPECT TO AMOUNT

INFLUENCERS	AHMEDABAD		SOLAPUR		GULBARGA	
	Average	Variance	Average	Variance	Average	Variance
Herself	2.314	0.592	2.550	0.421	2.220	0.623
Husband	2.129	0.674	1.883	0.613	1.864	0.533
In-laws	1.194	0.288	1.150	0.197	1.186	0.223
Friends	1.129	0.169	1.217	0.206	1.440	0.423
Investment companies	1.324	0.277	1.233	0.249	1.305	0.388
F	84.38886*		65.15077*		24.84885*	

IN RESPECT TO TIME

INFLUENCERS	AHMEDABAD		SOLAPUR		GULBARGA	
	Average	Variance	Average	Variance	Average	Variance
Herself	2.222	0.604	2.500	0.457	2.220	0.623
Husband	2.083	0.675	1.917	0.586	1.831	0.591
In-laws	1.213	0.318	1.150	0.197	1.220	0.278
Friends	1.157	0.189	1.217	0.206	1.441	0.389
Investment companies	1.324	0.277	1.233	0.249	1.373	0.376
F	68.14593*		61.59702*		21.48718*	

IN RESPECT TO TYPE OF INVESTMENT

INFLUENCERS	AHMEDABAD		SOLAPUR		GULBARGA	
	Average	Variance	Average	Variance	Average	Variance
Herself	2.185	0.619	2.517	0.457	2.051	0.669
Husband	2.213	0.674	1.950	0.625	1.898	0.714
In-laws	1.176	0.258	1.200	0.264	1.220	0.278
Friends	1.222	0.267	1.383	0.478	1.492	0.461
Investment companies	1.379	0.368	1.350	0.367	1.542	0.666
F	66.81524*		41.08548*		11.71972*	

SOURCE: Author's calculations

*At 5 per cent significance level F critical value 2.388596 (df v1 = 4, v2 = 535)

*At 5 per cent significance level F critical value 2.402771 (df v1 = 4, v2 = 290)

*At 5 per cent significance level F critical value 2.402246 (df v1 = 4, v2 = 295)

REFERENCE

Acharaya Meena and Bennett Lynn (1982), "*Women and the Subsistence Sector-Economic Participation and Household Decision Making in Nepal*", World Bank Staff Working Paper No. 526. The World Bank, Washington D.C, USA.

Basu A. M. (1996), "Girls Schooling, Autonomy and Fertility Change, What Do These Words Mean in South Asia?" in Jeffery Roger and Basu A.M.(Ed.), *Girl's Schooling, Autonomy and Fertility Change in South Asia*, Sage Publication Ltd., New Delhi, pp.48-71.

Blank, Christine (1997), "Women investing wisely", *American Demographics*, Vol.19 (8), August, pp.22-27.

Blood, Robert Jr. And Wolfe, D.M, (1960), *Husbands and Wives - The dynamics of married living*, Free Press, New York.

Bramrah, P.S. (1966), "Relative Influence" in Hema Tripathi and Arya H.P.S (1994), "Decision making patter of farm women in animal husbandry enterprise", *Decision*, Indian Institute of Management, Calcutta, July-September, Vol.21 (3), pp.171-178.

Caldwell Bruce (1996), "Female Education, Autonomy and Fertility in Sri Lanka" in Roger Jeffery and Basu A.M.(Ed.), *Girl's Schooling, Autonomy and Fertility Change in South Asia*, Sage Publication Ltd., New Delhi, pp.288- 321.

Chauhan Indira (1986), *Purdah to Profession - A case study of working women in M.P.*, B.R.Publishing Corporation, Delhi, pp.44,126-128, and 161-163.

Heer M David, (1958), "Dominance and working wife", *Social Forces*. Vol. XXV, May, pp.341-347.

Dubey V.K., Singh S.B. and Khera J.K. (1982), "Role of Rural Women in Decision Making with respect to Animal Husbandry Practices", *Indian Journal of Home Science*, Vol.14 (2), pp.18-21.

Gaudart J. Dorothea (1975),"Women and social policy decision making - the case in Austria", in International Institute for Labour Studies, Psychological, Social and Political obstacles to decision making; Research Series No.23, Research Symposium on Women and Decision-Making, Social Policy Priority, Geneva, November, pp.17-19.

Holfman, Lois and Nye, Ivan., (1974), *Working Mothers*, Jossey- Bass, San Francisco. p.256.

Jeffery and Basu (1996), "Schooling as Contraception?" in Jeffery Roger and Basu A.M. (Ed), *Girls' Schooling, Women's Autonomy and Fertility Change in South Asia* Sage Publication Ltd., New Delhi, pp.5-47.

Devi Lalitha (1982), *Status and employment of women in India*, B.R. Publishing Corporation, Delhi, pp.52 and 45.

Visaria Leela (1996), "Regional Variations in Female Autonomy and Fertility and Contraception in India" in Jeffery Roger and Basu A.M. (Ed), *Girls' Schooling, Women's Autonomy and Fertility Change in South Asia*, Sage Publication Ltd., New Delhi, pp.235-268.

Lynch Merrill (1979), "Merrill Lynch Campaign Targeted at Women Stresses Investment Options", *Marketing News*, Vol.13 (11), November, p.11.

Muthuchidambaram, S (1992), "Women Construction Workers of Kodaikanal - A case Study", *The Indian Journal of Social Science*, Vol.5 (1), January-March, pp.115-136.

Pattnaik Tilottama (1996), "Decision making behaviour of women in farm sector: a study", *The Indian Journal Of Social Sciences*, Vol. 57 (2), April, pp.235-244.

Reddy Raghunadha. C (1986), *Changing Status of Educated Working Women*, B.R.Publishing Corporation, Delhi, pp.118-122.

Ramu, G.N. (1989), *Women, Work and Marriage in Urban India- A study dual and single earning couples*. Sage Publications Ltd., New Delhi.

Rickson Tufts Sarah and Daniels L. Peter (1999), "Rural Women and Decision Making, Women's Role in Resource Management During Rural Restructuring", *Rural Sociology*, Vol.64 (2), pp.234-250.

Schieber, Sylvester (1999), " Making the most of 401 (k) plans, Who's choosing what and why?" *Compensation and Benefits Management* Vol.14 (4), Autum, pp.63-65.

Singh, T.R (1968), *Participation of Rural Women in Decision Making Process Related to Farm Business With Special Reference to Farm Families in NES Block*, M.Sc. Thesis, College of Agriculture, Jabalpur.

Tripathi Hema and Arya H.P.S (1994), "Decision making pattern of farm-women in animal husbandry enterprise", *Decision*, Indian Institute of Management, Calcutta, July-September, Vol.21 (3), pp.171-178.

Talwar Usha (1984), *Social Profile of Working Women*, Jain Brothers, Jodhpur, p.117.

Vidya Rani, G (1990), *Status of Women Employees in Government*, Mittal Publications, New Delhi.

Vlassoff Carol (1996), " Against the Odds, The Changing Impact of Schooling on Female Autonomy and Fertility in an Indian Village" in Jeffery Roger and Basu A.M. (Ed.), *Girls' Schooling, Women's Autonomy and Fertility Change in South Asia*, Sage Publication Ltd., New Delhi, pp.218- 234.

Wilkening, E. A., and Morrison D.E. (1963), " A Comparison of Husband and Wife Response Concerning to Who Makes Farm and Home Decisions", *Journal of Marriage and Family*, Vol. 25 (8), p.349.

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