# Pattern of Investment of Households Among Different Income Group in NCR

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### **Abstract**

In today's world households are looking for the best way to invest their hard earned money to get more and more return and minimize the risk. Why households need to invest their hard-earned money. It is really a very important decision. Investment is the way of earning the more money. An investment is the obligation of funds at present, in eagerness of some positive income in future. Today the variety of investment is very wide and households have so many options for investment according to their earning and future expectation. People are earning, but not aware of the options available into the market, when and how to devote their money earned by them. A proper literacy of finance is very much required so that a household can choose best option for him. So many investment avenues like bank deposits, real estate, small savings, life insurance schemes, mutual funds, and equity and preference shares are available into the market. Among all investment avenues, bank deposits are safest and most ideal by the household. Indian economy is doing indeed well in recent years. The study basically focuses on the specific income group and their pattern of investment avenues, factors considered for investment of demographic factors like income, gender, age, occupation, education and dependency ratio.

**Keywords** - Investments avenues, Financial literacy, Savings, Investor.

### Introduction

In the today's world all the individuals and households are occupied in various financial activities depending on the accessibility of money and possibility of return from the activities to generate income to meet the basic requirements then if there is any amount is left than unused amount is considered as the saving which can be utilized in future. If the savings are kept at the residence and may be in safety lockers then there will not be any returns because both the places don't generate return and money would be idle. If it is invested in to market by choosing any medium, sufficient income may be generated from the reserves. Hence households try to invest their saving into different investment avenues which are easily available into the monetary market so that maximum utilization of resources can be done by opting the suitable option to get maximum returns.

The primary motivation of investment for a household is to modify his consumption pattern for availing higher levels of consumption in future. The assurance of resources are saved or put away from current utilization with the expectation that some benefits will accumulate in future. The reserves depend on

"Time value of money" which explains that "value of money today having more worth than tomorrow". In past days money was not invested, as avenues for investments were not accessible and the only option left with, was dumping this money in secret places to save it from theft and for future usage. As such, households were not getting any return on that. Now days, various avenues of investments are available for investors. At present, apart from deposits in bank and stock market, other modes of investments are also available, such as NSC's, PPF's, Chit Funds, Mutual Funds, Insurance, and Investments in commodities like gold silver, jewellery and plots land and house. The approach of households towards investment varies with their age, gender, marital status, educational level, occupation, income, dependency ratio and so on.

There are some households who think that investments is very striking because they can participate in the decision making process and withdraw their money if they see that failure may be arise. It cannot be predicted that investments will be always worthwhile, as investor selection of different investment avenues is not always make the correct there could be risk of uncertainty always associated with the investment. However households can earn the maximum profit from investment by diversification of their money into different avenues of investment.

Investment is high risk opportunities. Mostly every individual or households make the investment because of any reason, it may be future prospective or higher education of children, may be for own house. Sometimes investors are confused for while selecting the correct investment avenues even though they made the investment sometimes for pension plan, and employee saving program or through purchase of life insurance or by some other mode of investment like investing in Real Estate (Property) or in debts or in saving schemes of post offices. Each of this investment has some common features like future return, security of money.

The future is uncertain, and you must determine how much risk you are willing to bear since higher return is associated with accepting more risk the households should start by specifying investment goals. Once these goals are established, the households should be careful with the way of investing and the environment in which investment decisions are made. These include the steps by which securities are issued and consequently bought and sold, the policy and tax laws that have been enacted by various levels of government, and the sources of information concerning investment that are available to the households.

#### Literature review

This part of the paper concern with the literature, saving motives, along with studies that investigate the impact of saving motives on saving behaviors. This chapter also reviews research that explores the importance of saving motives reported by households from various countries. Baliyan M (Baliyan *et al.*, 2016) study about the determinants o saving and investment of household and found that the demographic factors like age, occupation income and qualification have a major influence on saving and investment.

The perception of investor's behavior for online trading. The study identified that Indian investors are more conservative, middle age, educated and have sufficient income base examined by (Balaji *et al.*.2014). The behavior of individual investor in stock market, particularly perception and the attitude of the investor's with special reference to stock market examined by (Rakesh *et al.*, 2014). The result indicates that income and savings are two major factors which affect the decisions of investors.

Palanivelu (Palanivelu *et al.*,2013) in their study identified that certain factors like education level, awareness about the current financial system and investor's age etc. made significant impact on salaried employees while deciding the investment avenues. Puneet (Bhushan *et al.*, 2013) concluded that women are more conservative and takes less risk and significant gender differences occur in investment preferences for health insurance, fixed deposits and market investments among employees.

Dr. Bhawana (Bhardwaj *et al.*, 2013) studied about the different pattern of income ,saving and consumptions of employees and concluded by cross-tabulation of data knowledge about securities and income level reveals that as the income of the employee's increases, awareness about securities also increases. The studied about the awareness of the investors regarding different investments options available into the market and he suggests that the more awareness should be there to increase the investment (Alagu Pandian *et al.*, 2013). He found that the mainly investment in banks and in gold are attractive for the investment purpose because of safety of the fund.

The behaviour of investor's of the middle income class households in Nagpur is examined (Samudra *et al.*, 2012) and found that it is not only the income of the house that has an immediate bearing on the investment preferences but also the age group to which the head of the house belongs that influences the choice of avenues of investments.

# **Research Design**

This study is an empirical as this study has tried to analyse the different determinants which have an influence on the behaviour of saving and investment of different income groups as this study id based on hypothesis testing so it is also the descriptive study.

## Demographic profile of respondents

**Table 1:** Summary of demographic profile

Variables	Particular	Frequency	Percent	
Gender	Male	304	75.4	
	Female	96	23.8	

	18-25	203	50.4
	25-35	126	31.3
Age	32-45	46	11.4
	45-55	23	5.7
	more than 55	2	0.5
Marital Status	Single	204	50.6
Wartar Status	25-35     12       32-45     46       45-55     23       more than 55     2       Single     20       Married     18       Highschool     6       Intermediate     22       Graduation     10       Post graduation     26       Salaried     17       Business     10       Professional     60       Other     60       less than 36000     39       36000-60000     65       60000-100000     83       100000-200000     61       200001-500000     90       500001-1000000     54	188	46.7
	Highschool	6	1.5
Qualification	Intermediate	22	5.5
	Graduation	109	27.0
	Post graduation	263	65.3
	Salaried	177	43.9
Occupation	Business	103	25.6
Occupation	Professional	60	14.9
	Other	25-35     126       32-45     46       45-55     23       more than 55     2       Single     204       Married     188       Highschool     6       Intermediate     22       Graduation     109       Post graduation     263       Salaried     177       Business     103       Professional     60       Other     60       less than 36000     39       36000-60000     65       60000-100000     83       100000-200000     61       200001-500000     90       500001-1000000     54	14.9
	less than 36000	39	9.7
	36000-60000	65	16.1
Income	60000-100000	83	20.6
	100000-200000	61	15.1
	200001-500000	90	22.3
	500001-1000000	54	13.4
	more than 1000000	8	2.0

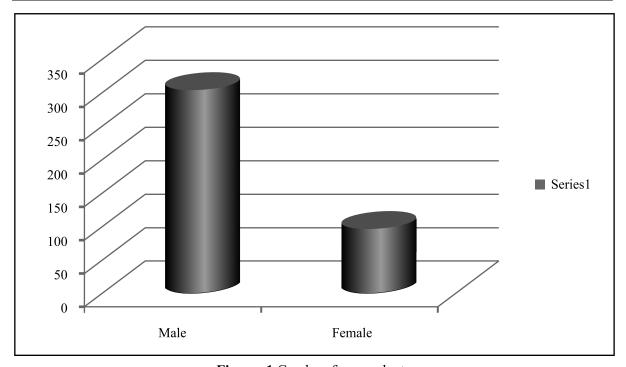


Figure: 1 Gender of respondents

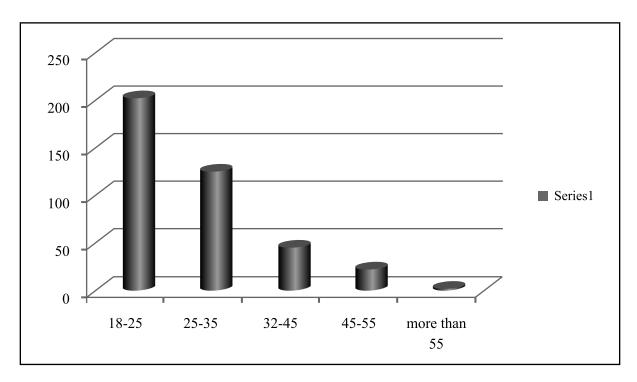


Figure: 2 Age of Respondents

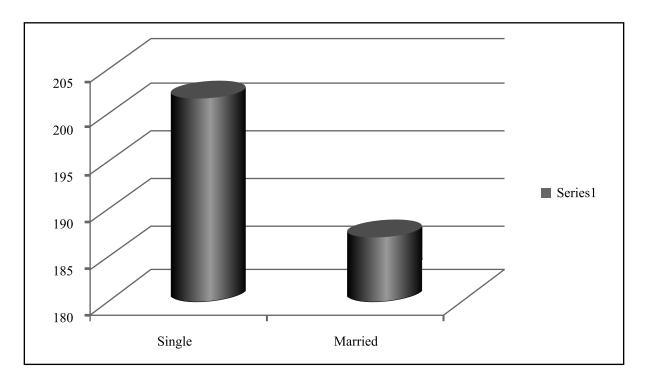


Figure:3 Marital status of Respondents

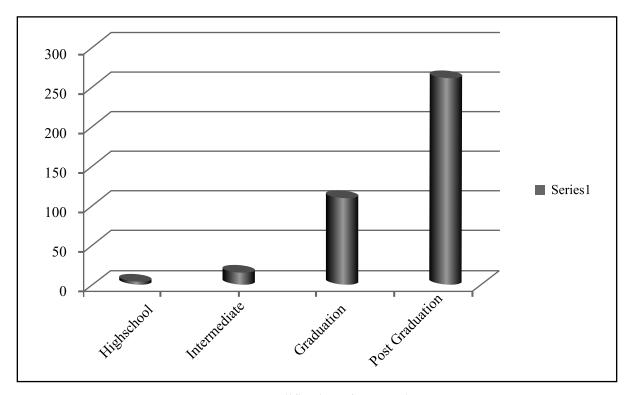


Figure:4 Qualification of Respondents

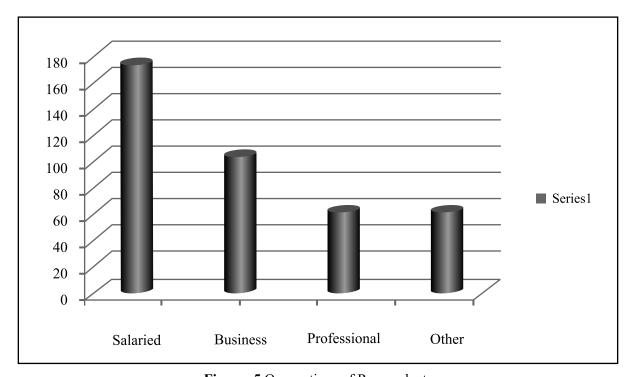


Figure: 5 Occupations of Respondents

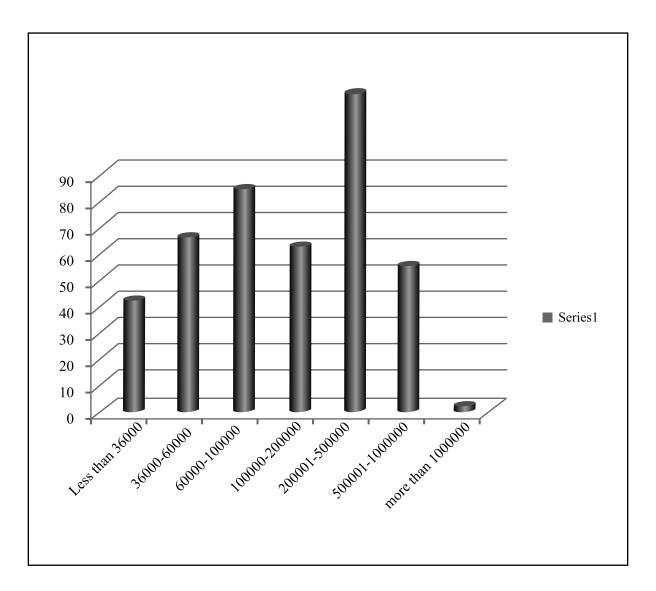


Figure: 6 Income levels of Respondents

## **Objective & Hypothesis**

# 1. Pattern of investment among different income group.

 $\mathbf{H}_{O1}$ . Investment pattern do not change among different income groups.

**H**<sub>al:</sub> Investment pattern tends change among different income groups.

## Data analysis and interpretation:

For meeting the objective of the study researcher has applied the ANOVA and Independent T test for testing the hypothesis.

Analysis of Variance for different investments avenues

Table: 2 ANOVA		Sum of Squares	Df	Mean Square	F	Sig.
Amount of Investment in bank	Between Groups	8.194	6	1.366	3.480	.002***
	Within Groups	154.243	393	.392		
	Total	162.437	399			
Amount of investment in MF & equity	Between Groups	22.336	6	3.723	4.393	.000***
	Within Groups	333.062	393	.847		
	Total	355.398	399			
Amount of investment in Real Estate	Between Groups	33.001	6	5.500	11.028	.000***
	Within Groups	195.999	393	.499		
	Total	229.000	399			
Amount of investment in gold	Between Groups	13.814	6	2.302	7.455	.000***
	Within Groups	121.376	393	.309		
	Total	135.190	399			

Source: Compiled by researcher

The above table show the outputs of the ANOVA analysis and whether we have a significant difference between our group means. We can see that the significance level is 0.002~(p=.002),~0.000~(p=0.000),~0.000~(p=0.000),~for~investment~made~by~households~in~debts,~equity,~real~estate~and~commodities~respectively~which~is~below~0.05~(95%confidence~interval). And, therefore it indicates that overall model is significant therefore the model put up is validated.

One of the objectives raised by the study was to that particular investment choice differs with the change of income. To verify the hypothesis independent-samples t-Test was used. Hypothesis was tested at 0.05 level of significance. The independent-sample t test evaluates the difference between the means of two independent or unrelated groups. That is, we evaluate whether the means for two independent groups are significantly different from each other. The independent-samples t test is commonly referred to as a between-groups design, and can also be used to analyze a control and experimental group. With an

a. Dependent Variable: Investment in debts, equity, real estate and commodities

<sup>\*\*</sup>significance at 5%, \*\*\*significance at 1%

independent-samples *t* test, each case must have scores on two variables, the grouping (Independent) variable and the test (dependent) variable. The *t* test evaluates whether the mean value of the test variable for one group differs significantly from the mean value of the test variable for the second group. Table 5.1 given below shows the results of the independent-samples t-Test.

Null Hypothesis:

 $H_0 = u_1 = u_2$ 

Where,

 $u_1$  stands for the mean for the first group and  $u_2$  stands for the mean for the second group.

Alternate Hypothesis:

 $H_a = u_1 \neq u_2$ 

 Table 3: Independent T test

Table 3 Independent Samples Test										
	1	Levene's		t-test for						
		Test for		Equality						
		Equality		of						
		of		Means						
		Variance								
		S								
			Sig.	Т	Df	Sig. (2- tailed)	Mean Differ ence	Std. Error Differe nce	95% Confidenc e Interval of the Differenc	
									e Lower	Linnor
Amount of	Equal								Lowei	Upper
Investment in bank	variances assumed	11.709	0.001	1.785	102.000	0.077	-0.179	0.101	-0.379	0.020
	Equal variances not assumed			1.671	64.593	0.100	-0.179	0.107	-0.394	0.035
Amount of investment in MF & equity	Equal variances assumed	0.001	0.972	1.523	102.000	0.131	-0.256	0.168	-0.590	0.078
	Equal variances not assumed			1.470	71.625	0.146	-0.256	0.174	-0.604	0.091
Amount of investment in Real Estate	Equal variances assumes	29.003	0.000	2.498	102.000	0.014	0.164	0.066	0.034	0.294
	Equal variances not assumes			1.988	40.754	0.054	0.164	0.083	-0.003	0.331
Amount of investment in gold	Equal variances assumes	5.235	0.024	0.884	102.000	0.379	0.092	0.104	-0.115	0.300
	Equal variances not assumes			0.946	96.304	0.347	0.092	0.098	-0.101	0.286

From the table, it is revealed that the F values for Levene's Test for Equality of Variances 11.70,0.001, 23.003 and 5.235 with a Sig. (p) value of .000 (p < .001). Because the Sig. value is less than the alpha value of .05 (p < .05), except investment in mutual funds we reject the null hypothesis for the assumption ofhomogeneity of variance and conclude that there is a significant difference between the two group's variances ( $H_o$ : $6_1^2 = 6_2^2$ ). As the assumption of homogeneity of variance is not met, the data results associated with the "Equal variances not assumed," have been taken into account (Cochran & Cox, 1957 adjustment for the standard error of the estimate. Had the sig. (p) values been greater than the alpha value of .05 (p > .05), we would have retained the null hypothesis and concluded that there is not a significant difference between the two group's variances.

It is further revealed from the Independent-Samples t-Test that the *t*-values for different investment option that is Debts, mutual funds, real estate and commodity especially gold 1.785, 1.523, 2.498 and 0.884 respectively. As these values resulted in a sig. (*p*) value which is less than the alpha of .05 (p<.05), we reject the null hypothesis ( $H_0 = u_1 = u_2$ ) in support of the alternative hypothesis ( $H_a = u_1 \neq u_2$ ) and saving and investment tends to rise as income increases.

## **Findings**

The study was to undertake that saving and investment tends to rise as income increases. To verify the hypothesis independent- samples t-Test was used. Hypothesis was tested at 5% level of significance. The Levene's F Test for Equality of Variances is used to test the assumption of homogeneity of variance. This test uses the level of significance set in advance for the *t* test analysis and it is revealed that the *F* values for Levene's Test for Equality of Variances were significant. except investment in mutual funds we reject the null hypothesis for the assumption of homogeneity of variance and conclude that there is a significant difference between the two group's variances. For this objective ANOVA was also used which shows that the output of the ANOVA analysis and whether we have a statistically significant difference between our group means. For investment made by households in debts, equity, real estate and commodities respectively which is below 0.05 and, therefore it indicates that overall model is significant therefore the model construct is validated.

#### Conclusion

This paper has analyzed the pattern of households among the different income groups. Study has identified four main avenues of investment namely Debt (including bank deposits, RD, FD, saving accounts, current account and any other interest bearing investment avenue), Equities (equities and mutual funds) Real Estate and Commodities (Gold, Silver and jewellery). Four different hypotheses have been set according to four different avenues of investment and step wise regression, ANOVA and independent t test has used. Researcher found that the income and investment are significantly related.

Analyzing the pattern of investment among the different occupation groups, it was found that, financial investment is mostly made by the salaried employees and self-employed. In all these group deposits mostly in Debts and mutual funds. They invested 44.25% and 25.75% in Debts respectively and 37.5%

and 19.75% in mutual funds. Professionals invest mostly in Debts mutual funds and commodities salaried group and the self-employed are the occupation groups who have invested most in physical assets that is real estate. They have invested 7.75% and 6% of their investment in real estate. Hence the hypothesis that saving tends to rise as income increases has accepted.

Financial investments in absolute income show growing trend for the increase in the income level for the lower income groups, save in saving account, RD Account, FD Account, Current Account, PF Account. Whereas for the higher income classes deposits account for a most important segment of financial investment. This is because; at upper levels of income people prefer more of security of funds. Generally, we found that preference for investment in Debts for households belonging to all income groups.

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