



# BEHAVIOURAL ASPECTS OF MULTIDIMENSIONAL POVERTY- A CASE STUDY OF SUNDARGARH DISTRICT OF ODISHA.

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## Abstract

*The monetary policy, fiscal policy and taxation are not the only factor of economic development but it also rooted in human psychology, sociology, culture and norms. Similarly, Self-management and self-control are the capability of the people to make right choices which should be consider for both the poverty measurement and eradication with the rational-cum new classical behaviour as it is not much helpful to eliminate the problems of chronic poverty in India. In this study we explore the theoretical relationship as well as empirically examine how self-management and self-control are related with the subjective wellbeing of the people in the context of multidimensional poverty. The present study is based on both the primary and secondary data. The present study used convenient sampling method and conducted face to face personnel interviews to collect primary data of 200 household by structured questionnaire across the Sundargarh district of Odisha. In this study statistical tools like, descriptive statistics, multiple regression and multiple correlation were used to examine the relationship between self-management and self-control and the subjective wellbeing. The result of the study indicates that there is strong association between the variables self-management and self-control and subjective wellbeing. The suggestions of the study are to conduct more research work in search of the path to happiness i.e., subjective wellbeing of the people.*

**Key words-** Behavioural aspects of Multidimensional poverty, Self-management and self-control (SMSC), Subjective Well-being.

## Introduction:

Poverty eradication is one of the principles objectives of Indian development planning in the post-independence era. This in turn strengthens social, political and economic outcomes as the goal is important in it-self. Social and socio-economic are the two facets of poverty in India (Ankuran, 2020<sup>1</sup>). Damien and Rafi defined poverty as the inability to secure the minimum consumption requirements for life such as food, clothing, education and health. Poverty is viewed as a state of absolute deprivation. Poverty can be defined as a social phenomenon in which a section of the society is unable to fulfil its basic needs. In India, Still there are millions who don't have access to the basic amenities of life despite several efforts by the govt to lift the poor out of the chronic poverty. The matter of intensity of poor and the downtrodden in India is serious concerns for both policy makers and academia as in India around 25% and in Odisha

<sup>1</sup> Alok, A. (2020). Problem of poverty in India. *International Journal of Research and Review (Ijrrjournal. Com)*, 7(1).

around 40% populations still live-in abject poverty. No doubt, the government has not been providing basic facilities to the poor people as in the past they were living away from socio-economic boundary. But the problem is on the demand side also, as it was pointed out by many-scholars. In Odisha, most of the poor people staying away from the mainstream.

### **Measures of poverty by the traditional economists:**

Initially in India poverty was measures in terms of unidimensional based on income or expenditure. In 1970s for the first-time planning commission appoint a task force on the project to define per capita consumption expenditure to measure poverty. According to recommendation of the task force, 2100 calories for urban habitants and 2400 calories for rural habitants is the basic food intake requirement. The only income and expenditure are not satisfied to measure poverty in terms of wealth, the MPI was introduced to measure incidence and intensity of poverty by introducing health, education and standard of living in 2010 by OPHI (Oxford Poverty and Human Development Initiative) and UNDP (United Nations Development Program).

### **Critics to the rational-cum new classical behaviour:**

Traditionally, economists have assumed economic agent to be rational calculators of their self-interest and utility maximiser. But in real world economic agent behave irrational as they get influenced strongly by their social norms, often fall back on simple heuristics (rules of thumb), make different choices on hot and cold states, lack of self-control, more concern about possibilities of losses than possible gains, sharply discount the future to the present, settle for something that is good enough rather than searching for the best, often act reciprocally, strong default to maintain status quo, fail to complete a tax return even if they are entitled to a tax refund, limited computational capacity etc. it is an issue to criticize the rational-cum new classical behaviour as the people's choice behaviour deviates from new classical norms of rationality.

### **Importance of Behavioural Economics:**

The notion of human rationality as implied by concept of homo economicus was challenged through the concept of bounded rationality proposed by Herbert Simon. As there are limits to our thinking, available information and time, it implies rationality is bounded (Simon, 1992<sup>2</sup>). In otherwards, economic agents are boundedly rational as most consumers and businesses do not have sufficient information to make fully informed judgements when making their decisions (Broder and Newll, 2008<sup>3</sup>; Simon, 1956<sup>4</sup>). Over day-to-day behaviour in markets is often strongly influenced by prevailing social norms or social customs (Charness and Rabin, 2002<sup>5</sup>; Thaler, 1988<sup>6</sup>). The emergence of Behavioural Economics was needed as the economic agents are systematic deviations from rationality are observed. Because theories are as good as their assumptions. Behavioural Economics is a discipline that attempts to explain and understanding how to mental mistake (cognitive errors), emotional, social and psychological factors an influence decision-making process of economic agents (Loewenstein, 1987<sup>7</sup>; Oster et al, 2013<sup>8</sup>; Brumermeier, 2005<sup>9</sup>). The importance for understanding Behavioural Economics for all is immeasurable as it is allowed for a better understanding of the consumer's decisions making process, marketers are able

<sup>2</sup> Simon, H. A. (1990). Bounded rationality. In *Utility and probability* (pp. 15-18). Palgrave Macmillan, London.

<sup>3</sup> Newell, B., & Bröder, A. (2008). Cognitive processes, models and metaphors in decision research. *Judgment and Decision making*, 3(3), 195.

<sup>4</sup> Simon, H. A. (1956). Rational choice and the structure of the environment. *Psychological review*, 63(2), 129.

<sup>5</sup> Charness, G., & Rabin, M. (2002). Understanding social preferences with simple tests. *The quarterly journal of economics*, 117(3), 817-869.

<sup>6</sup> Thaler, R. H. (1988). Anomalies: The ultimatum game. *Journal of economic perspectives*, 2(4), 195-206.

<sup>7</sup> Loewenstein, G. (1987). Anticipation and the valuation of delayed consumption. *The Economic Journal*, 97(387), 666-684.

<sup>8</sup> Oster, E., Shoulson, I., & Dorsey, E. (2013). Optimal expectations and limited medical testing: evidence from Huntington disease. *American Economic Review*, 103(2), 804-30.

<sup>9</sup> Hasumi, R., Iiboshi, H., Matsumae, T., & Nishiyama, S. I. (2019). Source of the Great Recession. In *Financial Crises-A Selection of Readings*. IntechOpen.

to develop value proportions that really fit for the consumer needs. Behavioural Economics is complementary not substitute or reject to the traditional economics.

### **Behavioural self-management in the context of multidimensional poverty:**

Recently, A.K. Sen specifies “Poverty” as deprivation in the capability to live a good life and subjective wellbeing. Now a days for better measurement of deep poverty we must take into consideration of psychological factors as suggested by Davis, R.P. and Williams, W.R., 2020<sup>10</sup>. If human development is one of the best indices of achieving development than the Sen’s capability perspective can be accepted as a point of reference to judge the level of development of any country has achieved. Capability is nothing but the ability of a person to make right choices to achieve the optimum level of accomplishment. Capability is also inclusive of subjective wellbeing of a person. But such issues of capability deprivations, unfreedoms and improper choice making exercises cannot be explained through the canvas of the traditional neo-classical economics. The New-classical paradigm having the behavioral perspective is the mainstay of the present-day economic thinking. The behavioral economic dimension is micro-theoretic in nature as it is individualistic in approach. Thus, at this individual point of reference the emphasis is on how an individual takes decision or make choices within the constraints of physical, financial and human resources. But such decision making is behavioral in nature because better decisions or right choices are made by those people who have a greater control on their own self which is categorized as self-management and self-control. Self-management and self-control determine the strength of psychological character that a person possesses and that affects the decision making. Better the decision making, right the choices are made and higher will be the subjective wellbeing of the people. Thus, capability of an individual can also be measured from the level of subjective wellbeing a person has achieved. The process of modifying one’s own behavior by systematically managing cues, cognitive process and contingent consequences is called Behavioral self-management. Self-management is 3 types- 1. S-M (Self-Monitoring- the individual tries to identifies in this stage). 2. S-E (Self-Evaluation-what you should do you must consider it is executive process). 3. S-R (Self-Reinforcement- it is the implementation stage by the individual himself).

In this particular study, the research problem is about how self-management and self-control determines the subjective wellbeing of a person. To understand the interactions properly we have tried to study the self-management and self-control aspects of the people of Sundargarh district of Odisha. Such an exercise is expected to throw lights on status of self-management and self-control skills of the population and its relationship with the subjective wellbeing of the same population.

### **Objective:**

1. To explore into the theoretical relationship between self-management, self-control and subjective wellbeing of the people in the context of multidimensional poverty.
2. To empirically examine how self-management and self-control are related with the subject wellbeing in respect of the households of the Sundargarh district of Odisha.

### **Review of litreture:**

Elster<sup>11</sup> (1989), he strictly criticizes to the homo economicus which is guided by instrumental rationality. In this study he tries to explain theoretically how the people were strongly influenced by the social norms. He thoroughly explains the reasons for which the social norms were exist. In this paper he concludes that the economic agents are bounded rational rather than fully rational.

Desai et al<sup>12</sup> (2008) try to explain the role of perceived political and economic inequalities and analysis survey data from 40 developing nations to understand the determinants radicalism data from World Value Survey (WVS), an international survey of attitude toward political and cultural issues across 80 countries. The data were collected from secondary sources in between 1981 to 2004. Here used some statistical tools

<sup>10</sup> Davis, R. P., & Williams, W. R. (2020). Bringing psychologists to the fight against deep poverty. *American Psychologist*, 75(5), 655.

<sup>11</sup> Elster, J. (1989). Social norms and economic theory. *Journal of economic perspectives*, 3(4), 99-117.

<sup>12</sup> Desai, R. M., Olofsgård, A., & Yousef, T. M. (2008). Poverty, Exclusion, and Dissent.

like OCS, Percentile etc. The study found out that the poor in developing nations, may be caught in a vicious circle of self-exclusion and greater marginalization. The findings of the study suggest that, the people's behavior is very bad towards Govt., because they feel themselves as marginalized. They do not participate in political movement to change their life and make them busy on community engagement.

Adrade and Areily<sup>13</sup> (2009) tries to explain how emotions influenced economic decision-making of an individuals. He empirically proves the enduring impact of transient emotions on economic decision-making by using a sequence of ultimatum and dictator games. He includes 110 students from a western university in the experiment. He measures by ANOVA, which shows there was significant interaction between emotions, level of anger and happiness. In this study he concludes that emotions can lead individual to make inferences about their own and other's preferences and eventually influence subsequent decision making.

Osei-Assibey<sup>14</sup> (2010) makes an attempt to explore the underlying socio-cultural factors which are main cause of voluntarily exclude of microentrepreneurs themselves from seeking external finances, despite, suffering from severe financial problems. The sample size was 176 microentrepreneurs in Ashanti region of Ghana were collected through structured Questionnaire. To find out the degree of utility, function model of credit demand in logistic regression technique was applied. The study found out that voluntary self-exclusion is not follow by microentrepreneurs or owner's socioeconomic status, but the most significant factors are their perceived difficulties in accessing external finance and cultural-religious biases are negative towards credit use or borrowing as well as financial illiteracy. The study suggests to creating awareness programs and also financial institutions should be promoted to meet their financial needs who exclude themselves due to religious beliefs.

Nasir<sup>15</sup> (2014) conducted a case study in 2014 to explore perception of 'self' more as group/collective/social identity in the name of religion, region and culture. The study used cluster random sampling method for collecting primary data by interviews with open and close-ended questions. This study found out that the Indian Muslims are strongly believed that even if they are educated, their prospects of getting job is minimum because of discrimination by affiliation and absence of representatives. These feeling is act as barrier for their development. This paper suggest that the self-exclusion must be subject of further research, evidence from the present study.

Nishimwe-Niyimbanira<sup>16</sup> (2020) critically compared the monetary approach with the multidimensional approach to poverty. This paper was based on both theoretically and case study. This paper determines the level of various deprivation suffered by a population in the rural area of Qwaqwa. This paper has been taken a sample of 404 household which was randomly selected. Alkire and the Foster family of measurement and the spearman correlation are used to analyzed multidimensional concept of poverty and well-being. The result indicates that the income measured present conservative estimate of poverty as compared to multidimensional measure. The findings of the study imply that the income measurement present conservative estimate of poverty as compared to multidimensional measure. The findings of the study imply a need to give priority to rural area such as Qwaqwa, when implementing efforts to elevate multidimension in South Africa.

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<sup>13</sup> Andrade, E. B., & Ariely, D. (2009). The enduring impact of transient emotions on decision making. *Organizational Behavior and Human Decision Processes*, 109(1), 1-8.

<sup>14</sup> Osei-Assibey, E. (2010). Choosing not to borrow: an evaluation of perception and socio-cultural factors underlying voluntary self-exclusion.

<sup>15</sup> Nasir, R. (2014). Muslim self-exclusion and public health services in Delhi. *South Asia Research*, 34(1), 65-86.

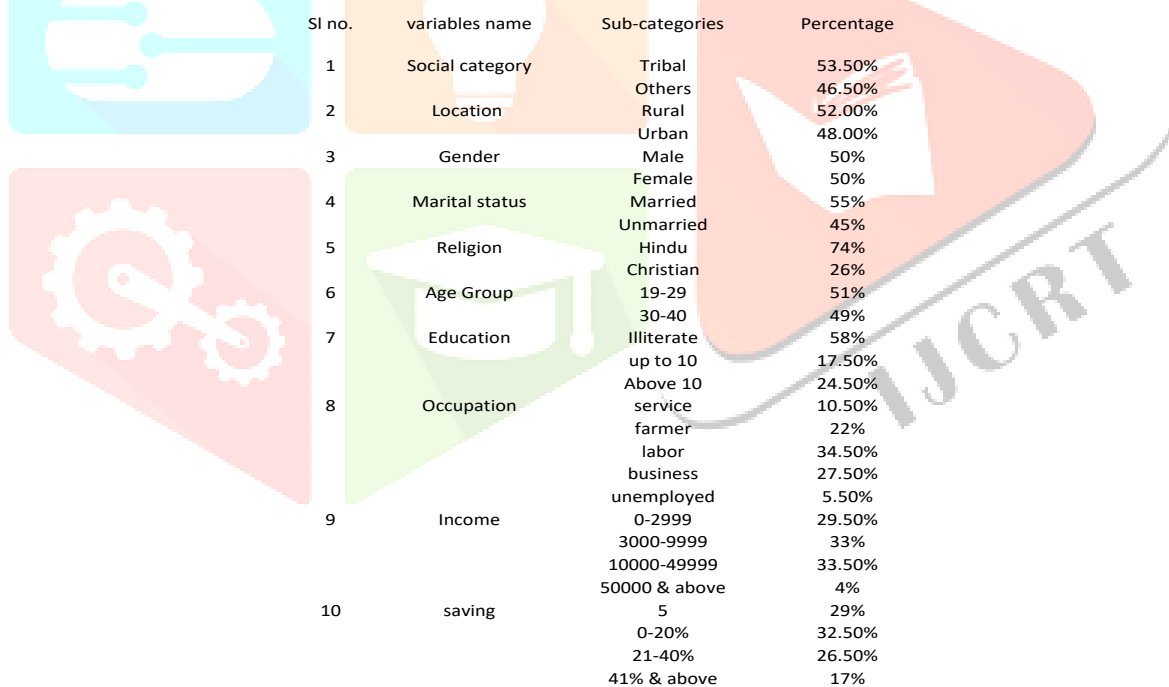
<sup>16</sup> Nishimwe-Niyimbanira, R. (2020). Income poverty versus multidimensional poverty: Empirical insight from Qwaqwa. *African Journal of Science, Technology, Innovation and Development*, 12(5), 631-641.

## Methodology-

This study is based on primary data. We used convenient sampling method to collect related primary data from the study area by using face to face interviews through structured questionnaire. The convenient sampling method has taken the strata on the basis of area (rural/urban), gender (male/female), education (literacy/illiteracy) and age group of households. We have compute and analyze the total score accordingly the primary data and also test the validity and normality of the data. We use the 4 standardize measurement skills used by psychologists i.e. 1. SMSC skills to measure the Self-Management and self-Control, 2. SCQ skills to measure the Self-Control, 3. SMST skills to measure Self-Management and Self-Tested and 4. SWLS skills to measure the subjective Wellbeing of Life Satisfaction of the sample households. To measure the qualitative data, we used 6 Likert scale rating for SMSC, 5 Likert scale rating for each SCQ & SMST and 7 Likert scale rating for SWLS. We calculate the total score of the sample households by the Likert scale rating of the primary data. After that we analyze multiple correlation and multiple regression by taking primary data of variables.

## Study area:

We have selected entire Sundargarh district as total population for the study. To covering both the rural and urban respondent, we chose Sundargarh municipality and Balisankara block for urban area and rural area respectively. Tumulia and Kantabahal villages of Balisankara block were selected as a sample unit for the rural area. We have collected primary data of two villages of the Balisankara block and Sundargarh Municipality by conducting personal face to face interviews with structured questionnaire to know the depth information about the mentioned study area and tried to explore the relationship between behavioral self-management and multidimensional poverty.



Sl no.	variables name	Sub-categories	Percentage
1	Social category	Tribal	53.50%
		Others	46.50%
2	Location	Rural	52.00%
		Urban	48.00%
3	Gender	Male	50%
		Female	50%
4	Marital status	Married	55%
		Unmarried	45%
5	Religion	Hindu	74%
		Christian	26%
6	Age Group	19-29	51%
		30-40	49%
7	Education	Illiterate	58%
		up to 10	17.50%
		Above 10	24.50%
		service	10.50%
8	Occupation	farmer	22%
		labor	34.50%
		business	27.50%
		unemployed	5.50%
		0-2999	29.50%
9	Income	3000-9999	33%
		10000-49999	33.50%
		50000 & above	4%
		5	29%
10	saving	0-20%	32.50%
		21-40%	26.50%
		41% & above	17%

Source: primary data

**Figure no.1-** Demographic profile of the sample households.

The above figure no. 1 shows the socio-economic status of the study area by location of the area, gender, caste, religion, education, occupation, monthly income and monthly saving of the sample households. The 52% and 48% of the sample population are belongs to rural and urban area. It is clear from the above table the number respondents from both male and female are equal to the sample unit. To get better validity of data we have taken both married as well unmarried respondents 55% and 45% respectively to the sample population. The above table shows that the respondents from illiteracy were more than literacy. We intentionally chosen in a large portion of Hindu respondents, as in the Sundargarh district Hindu people are more (74%) then non-Hindu (26%).

**Analysis of data and result:****Table no.1-** Correlation between SCMS with SM, SE and SR

		Correlations			
		SM	SE	SR	SMSC
SM	Pearson Correlation	1	-.147*	.166*	.766**
	Sig. (2-tailed)		.038	.019	.000
	N	200	200	200	200
SE	Pearson Correlation	-.147*	1	-.074	.355**
	Sig. (2-tailed)	.038		.298	.000
	N	200	200	200	200
SR	Pearson Correlation	.166*	-.074	1	.533**
	Sig. (2-tailed)	.019	.298		.000
	N	200	200	200	200
SMSC	Pearson Correlation	.766**	.355**	.533**	1
	Sig. (2-tailed)	.000	.000	.000	
	N	200	200	200	200

\*. Correlation is significant at the 0.05 level (2-tailed).

\*\*. Correlation is significant at the 0.01 level (2-tailed).

Source: Author's calculation

Table no.1 shows the correlation between SCMS with SM, SE and SR where there is a significant correlation between SCMS with SM, SE and SR.

**Table no. 2 -** Multiple regression analysis of SCMS=F (SM, SE & SR)**Model Summary**

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.766 <sup>a</sup>	.587	.584	4.81242
2	.900 <sup>b</sup>	.810	.808	3.27275
3	1.000 <sup>c</sup>	1.000	1.000	.00000

a. Predictors: (Constant), SM

b. Predictors: (Constant), SM, SE

c. Predictors: (Constant), SM, SE, SR

Source: Author's calculation

Table no.2 shows the Multiple Regression analysis of SCMS is a function of SM, SE and SR and the result shows that when SCMS is a function of SM its adjusted R square is 58.4% and when SCMS is a function of both SM & SE its adjusted R square increased to 80.8% and when SCMS is a function of SM, SE and SR the adjusted R square is 100%.

**Table no. 3-** Correlation between SCMS, SCQ, SMST and SWLS

		SCMS	SCQ	SMST	SWLS
SCMS	Pearson Correlation	1	.363**	.413**	.245**
	Sig. (2-tailed)		.000	.000	.000
	N	200	200	200	200
SCQ	Pearson Correlation	.363**	1	.177*	.034
	Sig. (2-tailed)	.000		.012	.632
	N	200	200	200	200
SMST	Pearson Correlation	.413**	.177*	1	.172*
	Sig. (2-tailed)	.000	.012		.015
	N	200	200	200	200
SWLS	Pearson Correlation	.245**	.034	.172*	1
	Sig. (2-tailed)	.000	.632	.015	
	N	200	200	200	200

\*\* . Correlation is significant at the 0.01 level (2-tailed).

\* . Correlation is significant at the 0.05 level (2-tailed).

Source: Author's calculation

Table no.3 shows the correlations between SCMS, SCQ, SMST and SWLS. The correlation analysis result shows that there is significant correlation between SCMS, SCQ, SMST and SWLS.

**Table no. 4-** Multiple regression analysis of SWLS= F (MSSC, SCQ, SMST)

#### Model Summary

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.264 <sup>a</sup>	.070	.056	3.74942

a. Predictors: (Constant), SMST, SCQ, SCMS

Source: Author's calculation

The result of the regression analysis shows significant association among the variables. The above table no.4 shows the R square is .070 and adjusted R square is 0.56 which indicates good fit for the model.

#### Summary and conclusion:

The emergence of Behavioural Economics during the last two decades has challenged the very foundation of the standard new-classical economics. The rationality postulates no longer remain valid and the reality is the application of bounded rationality to all economic decision making both at the micro and mini levels. The entry of behavioural dimension to economic decision-making has forced economists to look into other so called non-economic or psychological dimensions which have strong economic implications as far as the life of the common people are concerned.

Since the ultimate need of an individual is to remain happy within the limited of his or her resources. Happiness has a psychological dimension in addition to the economic one. But the reality is that happiness or psychological rather it is psycho-economic in true sense. Capability deprivations depends on the skills to manage the self and to control one's own behaviour.

There is close theoretical linkage between the behavioural self-management, self-control and the subjective wellbeing of a person. The economics of self-management and self-control does have a strong theoretical underpinning as far as the wellbeing of the people is concerned in psychological sense. Persons with strong self-management and self-control do have better life satisfaction as compared to the others with poor self-management and self-control skills. Thus, the factors like- SMSC along with self-tested own image influence subjective wellbeing and thereby the severity of multidimensional poverty.

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