

Impact of Gender Norms on Self-Concept among Elementary School Students: Role of Gender Stereotypes

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Abstract

The present study was designed to find out relationship of gender norms and gender stereotypes with self-concept. 150 participants were selected through non-probability purposive sampling technique. Correlational research design was used to analyze the current study hypotheses. Gender-Equitable Scale (Pulerwitz, et al., 2008), Robson's Scale of Self Concept (Robson, 1989), and Gender Stereotyping Scale is developed by Gunter & Wober (1982) were used to operationalize the construct of gender norms, self-concept and gender stereotypes, respectively. Findings of Pearson product moment correlation showed that gender norms and gender stereotypes were significantly and positively correlated with self-concept of students. Findings of hierarchical regression analysis showed that gender stereotypes played significant moderating role in relationship between gender norms and self-concept.

Keywords: Gender norms, Self-concept, Gender stereotypes, Gender difference, Hierarchical regression.

1. Introduction

Boys and girls are traditionally viewed as having distinct gender roles in society. Behaviors associated with masculinity as well as femininity and the way people understand their roles as female or male are all aspects of gender identity Eagly (2020). As a result, gender is linked to how people see themselves, with the result that most people of the same sex group identify themselves with certain characteristics. These characteristics have an impact on children's development. With little question, the circumstances in which a learner finds himself or herself have a significant influence on that child's development. Girl infants are handled differently than boy infants at birth, according to Berk (2010). Traditionally, little girls are treated with gentleness and clothed in pink.

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Boys, on the other hand, wear blue clothing and are treated harshly by their parents. When it comes to men and women's features and skills and how they are expected to behave, gender stereotypes are a set of preconceived notions (Reyes, et al., 2016). When children are treated differently, females are given more toys that conform to gender stereotypes, and it is inevitable that this will result in the children's appearance and behavior changing as they mature.

Children's understanding of categories, traits, and shifts in role-taking abilities may be influenced by stereotypic attitudes, according to Yang (2021). As a result, stereotypes serve as a reflection of a person's character traits and life experiences, which can show up in their interactions with others both inside and outside their local surroundings.

People's individual judgments of their own behavior, talents, and distinguishing features, or "self-concept," are often characterized as "a mental image of who one is as a person" Vidhya (2021). Findings from the study of Kenner (1999) illustrate the necessity of looking at both the student's and the teacher's perceptions of gender differences. She was able to establish a correlation between the views of the 122 teachers who participated in the study and the effects those beliefs had on their students. According to her findings, a teacher's age had a significant influence on their perceptions about gender. Sexist instructors (those of us who associate with the gender and interpret information through that lens) comprised up 67% of the sample, and they were ages 23-35, according to this study (Kenner, 1999). This association suggests that teaching experience may reduce the use of gender-based language.

This study is significant because it demonstrates that even at an early age, children are impacted by the gender norms and cultural expectations of their society, and that they base their decisions on their own interpretations of these factors. This links in with the concept of the reinforcement of gender stereotypes, which might possibly diminish a child's gender roles. This would be the case if the child's behaviors did not line with those of their gender norms, which can thus be altered by mediation or the absence of mediation. Krahé, (2018) found that gender norms have significant impact on self-concept. As gender norms adversely impacts self-concept and it undermines by gender stereotypes, it is worth investigating. Second, there is a dearth of research in determining the impact of gender norms on self-concept with specific role of gender stereotypes in the context of Pakistan, this research gap will likely be filled up by this study. The purpose of this study is to find out the impact of gender norms on self-concept among elementary school students by specifying the role of gender stereotypes.

Pakistan is a country where the topic of gender is prevalent. There is a patriarchal society mindset that favors males over girls since they keep the family lineage, as documented in "UN Appeal for Girls' Education" (2006). According to studies, despite efforts to change the situation, a large number of girls do not have the opportunity to attend school. There are several reasons why girls in Nigeria are not getting an education: poverty, a lack of financial support from their families and a societal desire for riches are just some of the elements that contribute to this Wood, et al., (2008). In indigenous cultures, the same effects might be predicted. It appears that there are contradicting research findings on the impact of gender and geography on pupils' academic performance and self-esteem. In light of these findings, this study focused on the impact of both gender stereotypes and students' self-conceptions on gender schemas. In several of the research covered here, the question of self-concept was not considered. These are the goals of the current investigation.

For this reason, the present research is aimed at filling the gaps in our understanding in this area.

2. Research Objectives

The current study was focused on the following research objectives;

- To find out relationship of gender norms and gender stereotypes with self-concept
- To find out the impact of gender norms on gender stereotypes
- To find out moderating role of gender stereotypes in between gender norms and self-concept

3. Hypotheses

In the light of the above research objectives, following hypotheses were formulated.

- Gender norms and gender stereotypes have significant relationship with self-concept
- Gender norms are likely to predict the self-concept
- Gender stereotypes play moderating role in between gender norms and self-concept

4. Research Methodology

In this empirical study, a correlation research design was used to assess relationship of gender norms, gender stereotypes with self-concept. A quantitative research design was adopted for the current study.

In Tehsil Kot Momin, total Govt. High Schools are forty-four, out of which twenty-three are the government boys' high schools and twenty-one are the girl's high schools. Therefore, through proportionate sampling technique, ten percent of the schools from both genders were selected randomly. Total two boys' high school and two girls' high school were selected. In total 150 (Girls=70 & Boys=80) participants were selected through the use of a non-probability purposive sampling technique.

To maintain the homogeneity of the sample some inclusion and exclusion criteria was decided on the basis of pervious literature (Kieper, 2021).

Inclusion criteria.

- Regular elementary school students were included.

Exclusion criteria.

- Students with any disability were excluded.
- Students with diagnosed psychiatric disorder or on any type of psychiatric medication were excluded.
- Defaulter (students expelled, not enrolled in school and taking examination privately) were excluded.
- Students doing part time jobs were excluded.
- Students with single parent or from separated/divorced family were also excluded due to their different nature of demographic factors.

Assessment Measures. According to the theoretical underpinnings, this study was based on self-report measures that gave the optimum operationalization of the variables used in this study. There was no issues with cross-cultural validity for any of the measures used in this study. The psychometric qualities of the selected measures were also be taken into account. Listed below were the specifications of these instruments in order:

Demographic Information Questionnaire. A self-constructed demographic sheet was administered in addition to other research tools to seek information about respondents. Demographic sheet includes information about age range i.e. 12 to 18 which were be measured as continuous variable, gender which were measured as discrete variable as male or female.

The Gender-Equitable Scale. It is developed by Pulerwitz, et al., in (2008). It is used to measure attitudes towards gender norms. The scale includes 24 items in two subscales. It shows responses, 1=Agree, 2=Partially Agree, and 3=Do Not Agree. The GEM Scale's average score was calculated by summing up the points each respondent scored and divide by the total number of participants (Do not include anyone for whom the enumerator failed to record any responses or who failed to answer any questions). It displayed the possible score range of 1 to 72. The higher the score, the more support there is for gender equality, whereas the lower the score, the less support there is.

Robson's Scale of Self Concept. Robson developed this scale in 1989. This is a scale used to assess one's own self-concept (Robson, 1989). It is comprised of thirty items in total. (e.g., "I have control over my life," "I feel emotionally mature," "I can like myself even if others don't"). Each of the items is built upon a foundation of seven components. For the sake of scoring, we used an eight-point scale (where 0 represents complete agreement and 7 represents complete disagreement). In terms of reliability (Cronbach's of.89) and clinical validity (i.e., clinical validity of.70), the Robson's Scale of Self Concept has been shown to be reliable (Ata Ghaderi, 2005). High score indicates the positive self-image and high self-esteem and lowest score shows the element of rejection and negative self-image.

Gender Stereotyping scale. The Gender Stereotyping Scale is developed by Gunter & Wober (1982). One of the primary goals of this study tool was to create and present preliminary evidence for a measuring of gender role stereotypes. A total of 14 questions are included, with responses ranging from "strongly agree" to "strongly disagree." In accordance with the author's scoring technique, Item 7 was reverse coded. Each respondent's points are totaled and divide it by the number of items in the questionnaire. Traditional gender stereotypes were found to be supported by higher scores on the composite scale (Cronbach's alpha=0.70).

Procedure. The principals/headmasters of primary schools were formally requested for permission to gather data for the current study. Following that, students were approached one-by-one in the hallways, cafeterias, and libraries where they were studying. After establishing a rapport, individuals were told of the study's goal and nature, and their permission was asked on an informed consent form. When participants signed up for the research, they were told there would be no danger to them from participating, and that they may opt out at any moment. Scale responses were kept private and anonymously utilized exclusively for research purposes, they were assured. A demographic sheet was used to collect the subjects' names and contact information. After then, students were given scales on which to rate their experiences.

After having their responses, they were acknowledged for taking part in the study, and at the conclusion of the research, participants were praised for the great cooperation they provided. In compliance with the APA's code of ethics, all respondents were treated fairly.

5. Results

In order to do statistical analysis on the given data, SPSS version 24 was employed. For each of the scales, we calculated descriptive statistics and reliability alpha coefficients. The current study's hypotheses were put to the test using correlations as well as linear and hierarchical regression analysis. The outcomes are presented in Tables 1 to 4, respectively.

Table 1

Descriptive Statistics and Psychometric Properties of Study Variables

Variables	K	Ranges		M	SD	A	^a Skewness	^b Kurtosis
		Minimum	Maximum					
Gender Norms	24	24.00	70.00	45.30	10.41	.86	-.08	-.67
Self-Concept	30	36.00	118.00	79.08	17.16	.84	-.48	.05
Gender Stereotypes	14	14.00	57.00	39.22	7.54	.67	-.68	.08

Note. N= 150, K = Number of Items of Scales, M = Mean, SD = Standard Deviation, α = Alpha Reliability

a = Standard Error of Skewness = .19

b= Standard Error of Kurtosis = .39

Table 1 showed the descriptive statistics and psychometric properties of instruments used to operationalize the current study variables i.e. gender norms, self-concept and gender stereotypes. Findings also highlighted that all the instruments used to operationalize the current study construct were reliable and internally consistent as alpha co-efficient of all instruments were above .70 except for gender stereotypes i.e. .67. Value of skewness and kurtosis with reference to standard error showed that the data were not departure of symmetry. Thus, choice of parametric test to analyze the proposed hypotheses was justifiable.

Table 2

Correlation of Gender Norms and Gender Stereotypes with Self-concept

Variables	1	2	3
1. Gender Norms	1	.681***	.401***
2. Self-concept		1	.658***
3. Gender Stereotypes			1

N = 150 ***p <.001

Table 2 showed the relationship of gender norms and gender stereotypes with self-concept. Findings highlighted that gender norms and gender stereotypes were significantly and positively correlated with self-concept of students.

Table 3

Linear Regression for the Prediction of Self-concept from Gender Norms

Variables	Self-concept	
	B	ΔR^2
Gender Norms	.68***	.46***

N = 150 ***p < .001

Table 3 shows the prediction of self-concept from gender norms. Findings showed that gender norms were significant and positive predictor of self-concept. Results also highlighted that gender norms explained 46 % variance in self-concept of students with $F(1, 148) = 167.63$, $p < .001$.

Table 4

Hierarchical Regression for Gender Stereotypes with Self-concept & Gender Norms

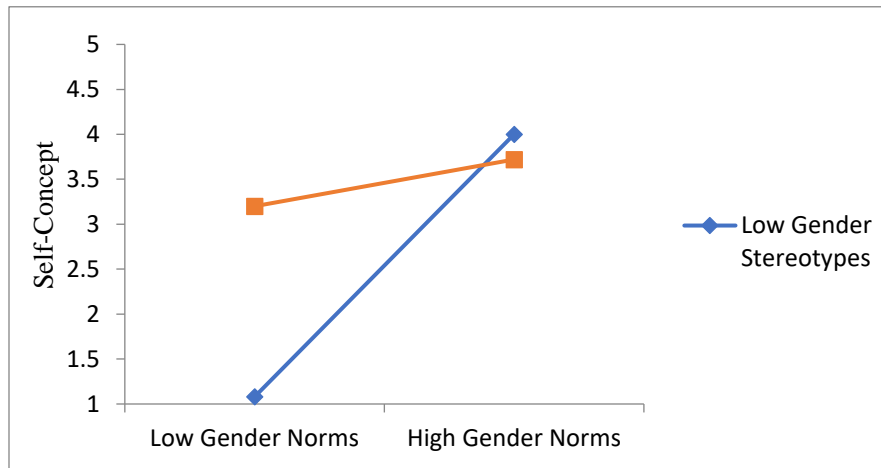
Variables	Self-Concept	
	B	ΔR^2
Step I		.46***
Gender Norms	.86***	
Step II		.64***
Gender Stereotypes	.45***	
Step III		.65***
Gender Norms X Gender Stereotypes	-.82***	

N = 150 ***p < .001

Table 4 shows the moderating role of gender stereotypes in relationship between self-concept and gender norms. In step I, gender norms were entered to see the prediction of gender norms for self-concept. Findings showed that gender norms were significant and positive predictor of self-concept. Results also highlighted that gender norms explained 46 % variance in self-concept of students with $F(1, 148) = 127.67$, $P < .001$. In step II, moderator variable i.e. gender stereotypes were entered to see the prediction for self-concept. Findings showed that gender stereotypes were significant and positive predictor of self-concept. Results also highlighted that gender stereotypes explained 64 % variance in self-concept of students with $F(2, 147) = 130.52$, $P < .001$. In step III, interaction of independent and moderator variables i.e. gender norms and gender stereotypes were entered to see the prediction for self-concept.

Findings showed that interaction were significant predictor of self-concept. Results also highlighted that interaction explained 65 % variance in self-concept of students with $F(3, 146) = 91.46$, $P < .001$ which showed that overall regression model were significant.

Figure 3. Moderating role of Gender Norms in relationship between Gender Norms and Self-concept



Interaction plots were drawn through Jerome Dowson excel sheet to analyze the moderating role of gender norms in relationship between gender norms and self-concept. Interaction plots showed that students from low gender stereotypes and strong gender norms have higher impact in forming the self-concept as compared to those students who have high gender stereotypes and strong and weak gender norms.

Table 5

Gender (Boys vs. Girls) Difference on Gender Norms, Self-Concept and Gender Stereotypes

Variables	Girls (n=66)		Boys (n = 84)		<i>t</i>	<i>p</i>	95 % CI	
	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>			<i>LL</i>	<i>UL</i>
Gender Norms	45.20	10.39	46.27	10.40	-1.21	.22	-5.43	1.28
Self-Concept	78.90	18.87	79.23	15.64	-1.20	.90	-5.90	5.23
Gender Stereotypes	39.28	7.74	39.16	7.44	.10	.92	-2.32	2.57

N= 150, M = Mean, SD = Standard Deviation, LL = Lower Limit, UL = Upper Limit

Table 6 showed the gender (boys vs. girls) difference on gender norms, self-concept and gender stereotypes. Results highlighted that mean score differences of boys vs. girls were non-significant for gender norms, self-concept and gender stereotypes.

Table 6

School Affiliation (Girls vs. Boys) Difference on Gender Norms, Self-Concept and Gender Stereotypes

Variables	Girls (n=70)		Boys (n = 80)		<i>T</i>	<i>p</i>	95 % CI	
	<i>M</i>	<i>SD</i>	<i>M</i>	<i>SD</i>			<i>LL</i>	<i>UL</i>
Gender Norms	45.77	9.85	44.86	10.92	.52	.60	-2.50	4.31
Self-Concept	79.83	17.11	78.18	17.15	.58	.56	-3.93	7.23
Gender Stereotypes	38.72	7.66	39.48	7.42	.92	.54	-3.20	1.69

N= 150, M = Mean, SD = Standard Deviation, LL = Lower Limit, UL = Upper Limit

Table 6 showed the school affiliation (Girls vs. Boys) difference on gender norms, self-concept and gender stereotypes. Results highlighted that mean score differences of students from Girls school vs. Boys schools were non-significant for gender norms, self-concept and gender stereotypes.

6. Discussion

The present study was intended to find out the relationship of gender norms and gender stereotypes with self-concept. Multiple hypotheses were stated and analyzed. Among them firstly, it was hypothesized that gender norms and gender stereotypes are likely to have relationship with self-concept among secondary school students. Pearson product moment correlation analysis was run to assess the stated hypothesis. Findings highlighted that gender norms and gender stereotypes were significantly and positively correlated with self-concept of students. Findings rejected the null hypothesis and supported the alternative hypothesis.

If the findings against this hypothesis are narrowed down it will explain the relationship in more detail. Gender norms and gender stereotypes are contributing in forming self-concept of students (Dresel et al., 2007). This stresses the need to focus on both schools as well as on home environments as essential factors in facilitating students' self-concept (Eccles & Wang, 2016).

Second hypothesis of current study was that gender norms are likely to predictor of self-concept. Findings showed that gender norms were significant and positive predictor of self-concept. Results also highlighted that gender norms explained 46 % variance in self-concept of students. This is in line with Steele et al. (2002), who found that gender norms manifest and affect their self-concept. Final and major hypothesis of current study was gender stereotypes are likely to play moderating role in between gender norms and self-concept. This hypothesis was assessed through hierarchical regression analysis with three steps. In step I, independent variable i.e. gender norms were entered and findings showed that gender norms were significant and positive predictor of self-concept. Gender norms explained 46 % variance in self-concept of students. In step II, moderator variable i.e. gender stereotypes were entered to see the prediction for self-concept. Findings showed that gender stereotypes were significant and positive predictor of self-concept and explained 64 % variance in self-concept of students.

In final step, interaction of independent and moderator variables i.e. gender norms and gender stereotypes were entered to see the prediction for self-concept. Findings showed that interaction were significant predictor of self-concept which highlighted that gender stereotypes is playing significant moderating role in relationship between gender norms and self-concept. This is in keeping with Steele et al. (2002), who observed that gender norms and stereotypic perspectives show up and have an effect on their self-concept. The findings additionally corroborate the findings of Vescio et al. (2005) who observed that effective application of stereotype is strengthens the association of gender norms and self-concept. Therefore, the usage of stereotypic perspectives may be responsible for the buffering impact in gender norms and self-concept.

Social learning theory was proposed by Bandura (1977) and given the concept of human being as “Social animal” which can be treated as positive and negative impact on his/ her attitude. Every person has its own way of thinking and learning, some people like executive thinking style, some like judicial thing style and some learners learn through modeling. By using different strategies and techniques learners make their concepts and create something new for their country.

Further added, gender difference was made between girls and boys on the basis of gender norms, gender stereotype and self-concept. The relationship between gender norm, self-concept and gender stereotype by using t-test and found that there was no significant relation exist between them Steele (2002).

More addition on the basis of government and private institutions, in these institutions gender difference was made on the basis of self-concept, gender stereotype and gender norms. To find out the relationship between them t-test was used and found that there was no significance relationship exist between them Tus (2020).

7. Conclusion

Gender norms and gender stereotypic attitudes have a facilitative effect on secondary school pupils' self-concept, according to the findings of this study. A person's self-concept is made up of their self-image, feelings or emotions, and beliefs. It refers to how people see themselves, including their prior and present experiences. All of these factors, when combined, have a favorable or harmful impact on persons, depending on the perspective from whence stereotyping individuals came and the norms in which they live. In general, the findings demonstrated that gender stereotypes and gender norms have a considerable impact on pupils' self-concept.

8. References

- Berk, L. (2010). *Development through the life span (5th ed.)*. Boston, MA: Allyn & Bacon.
- Dresel, M., Schober, B., and Ziegler, A. (2007). Golem und "Pygmalion. Scheitert die Chancengleichheit von Mädchen im mathematisch-naturwissenschaftlich-technischen Bereich am geschlechtsstereotypen Denken der Eltern?," in *Erwartungen in Himmelblau und Rosarot. Effekte, Determinanten und Konsequenzen von Geschlechterdifferenzen in der Schule*, eds P. H. Ludwig and H. Ludwig (Weinheim: Juventa), 61–81.
- Eccles, J. S., and Wang, M. T. (2016). What motivates females and males to pursue careers in mathematics and science? *Int. J. Behav. Dev.* 40, 100–106. doi: 10.1177/0165025415616201
- Steele, C. M., Spencer, S. J., Aronson, J. (2002). Contending with group image: The psychology of stereotype and social identify threat. In Zanna, M. P. (Ed.), *Advance in experimental social psychology* (Vol. 34, pp. 379-440). San Diego, CA: Academic Press.
- Vescio, T. K., Gervais, S. J., Snyder, M., Hoover, A. (2005). Power and the creation of patronizing environments: The stereotype-based behaviors of the powerful and their effects on female performance in Masculine domains. *Journal of Personality and Social Psychology*, 88, 658-672.
- Ertl, B., Luttenberger, S., & Paechter, M. (2017). The impact of gender stereotypes on the self-concept of female students in STEM subjects with an under-representation of females. *Frontiers in psychology*, 8, 703.
- Ghaderi, A. (2005). Psychometric Properties of the Self-Concept Questionnaire. *European Journal of Psychological Assessment*, 21(2), 139.
- Gunter, B., & Wober, M. (1982). Television viewing and perceptions of women's roles on television and in real life. *Current Psychological Reviews*, 2(4), 277-288.
- Igbo, J. N., Onu, V. C., & Obiyo, N. O. (2015). Impact of gender stereotype on secondary school students' self-concept and academic achievement. *Sage Open*, 5(1), 2158244015573934.
- Kenner, J. (1999). The EC Employment Title and the 'Third Way': Making Soft Law Work?. *International Journal of Comparative Labour Law and Industrial Relations*, 15(1).
- Kieper, G. S. (2021). *A Systematic Review of Gender and Academic Self-Concept in Secondary Education* (Doctoral dissertation, Washington State University).
- Krahé, B. (2018). Gendered self-concept and the aggressive expression of driving anger: Positive femininity buffers negative masculinity. *Sex Roles*, 79(1), 98-108.
- Kulis, S., Marsiglia, F. F., Lingard, E. C., Nieri, T., & Nagoshi, J. (2008). Gender identity and substance use among students in two high schools in Monterrey, Mexico. *Drug and Alcohol Dependence*, 95(3), 258-268.
- Pulerwitz, J., & Barker, G. (2008). Measuring attitudes toward gender norms among young men in Brazil: development and psychometric evaluation of the GEM scale. *Men and masculinities*, 10(3), 322-338.
- Reyes, H. L. M. N., Foshee, V. A., Niolon, P. H., Reidy, D. E., & Hall, J. E. (2016). Gender role attitudes and male adolescent dating violence perpetration: Normative beliefs as moderators. *Journal of youth and adolescence*, 45(2), 350-360.
- Robson, P. (1989). Development of a new self-report questionnaire to measure self-esteem. *Psychological medicine*, 19(2), 513-518.

- Tus, J. (2020). Self–concept, self–esteem, self–efficacy and academic performance of the senior high school students. *International Journal of Research Culture Society*, 4(10), 45-59.
- Vidhya, S. (2021). *Reflective Teaching, Self-esteem, Self-concept and Personality among Prospective Teachers*. Lulu Publication.
- Wood, D., Kurtz-Costes, B., Rowley, S. J., & Okeke-Adeyanju, N. (2010). Mothers' academic gender stereotypes and education-related beliefs about sons and daughters in African American families. *Journal of educational psychology*, 102(2), 521.
- Yang, M., Chen, I. J., Song, Y., & Wang, X. (2021). Comparison of intergenerational transmission of gender roles between single-parent families and two-parent families: The influence of parental child-rearing gender-role attitudes. *Children and Youth Services Review*, 125, 105985.