Spiritual Intelligence, happiness and success of students in select higher education institutions of University of Delhi
Shivani Raheja¹, Renu Gupta², Gayatri Yadav³

¹ Department of Commerce, Aryabhatta College, University of Delhi, Benito Juarez Road, New Delhi 110021, India
² Department of Commerce, Sri Guru Gobind Singh College of Commerce, University of Delhi, Pitampura, New Delhi 110034 , India
³ Department of Business Economics, Aryabhatta College, University of Delhi, Benito Juarez Road, New Delhi 110021, India

*Corresponding author: Renu Gupta, renugupta@sggsc.ac.in

ABSTRACT

Research background: Spiritual Intelligence (SI), often quoted as Spiritual Quotient (SQ) by some, means becoming aware of (realising) and expressing one’s innate spiritual qualities (love, peace, bliss, and purity) through cognitive thinking, attitude, and behaviour. Once we are aware of the true purpose of our being in the universe, our spiritual qualities help us in drawing spiritual strength to remain stable in all situations (Emotional Intelligence), be neutral towards negativity, truly understand others, and be at peace with not just one’s own self but with others and the world at large. When Spiritual Intelligence is applied in the workplace setting, it helps in aligning personal values with a clear sense of purpose, enhancing our power to accept change and adapt to newer perspectives in life. Purpose: The purpose of this study was to examine the relationship between spiritual intelligence, happiness and academic achievement among the students of University of Delhi. In this paper, an attempt has been made to understand the predominant factors strengthening spiritual intelligence and to critically evaluate the relationship between students’ spiritual intelligence, happiness, and academic achievement. Research methodology: Responses of 240 students at the undergraduate level from different colleges under the University of Delhi were studied to find out their level of spiritual intelligence, happiness and academic intelligence. Oxford Happiness Questionnaire, SISRI-24 Spiritual Intelligence Measurement Scale of D. King, and a self-designed Questionnaire known as Academic Achievement Assessment Tool for assessing the Academic Intelligence of the students were used by the authors as the data gathering tools. Findings/results: The results indicate that the Spiritual Intelligence and Happiness of the students are positively and significantly related to one another on both an overall basis and also in the case of males and females specifically at 1% significance level. However, this association was found to be more prominent for female students. Originality/value/novelty: The study offers future directions and implications for higher education practitioners. It also suggests that Spiritual Intelligence would be beneficial for the students as it increases their psychological well-being and for the betterment of the global society as a whole. Keywords: spiritual intelligence; spiritual quotient; emotional intelligence; happiness; academic achievement; higher education institutions; University of Delhi

CITATION

COPYRIGHT
Copyright © 2024 by author(s). Environment and Social Psychology is published by Asia Pacific Academy of Science Pte. Ltd. This is an Open Access article distributed under the terms of the Creative Commons Attribution License (https://creativecommons.org/licenses/by/4.0/), permitting distribution and reproduction in any medium, provided the original work is cited.
1. Introduction

Since time immemorial, IQ or Intelligence Quotient, intellectual abilities were considered as the most important trait to judge a person. With advancing time this was dominated by EQ, the Emotional Quotient, the ability of one’s self to hold onto emotions and be empathetic towards others. Of late, Spiritual Intelligence has become the most debatable area of psychological theory and research. Indeed, one can think of IQ as important for entrance in academic pursuits, EQ as essential for successful life and SQ as useful for a meaningful life.

The term Spiritual Intelligence is composed of two terms, Spiritual and Intelligence. It is often proclaimed that the paradigms of ‘spiritual’ and ‘Intelligence’ are related to each other and it was Zohar\textsuperscript{[1]} who coined the term SI, Spiritual Intelligence, and gave the fourth Intelligence to humankind (Physical Intelligence, IQ, EI being the other three types of intelligence). SI was later described by Zohar and Marshall\textsuperscript{[2]} as the intelligence used by humans to raise fundamental questions and reframe one’s responses.

Spiritual Intelligence (SI), often quoted as Spiritual Quotient (SQ) by some, means becoming aware of (realising) and expressing one’s innate spiritual qualities (love, peace, bliss, and purity) through cognitive thinking, attitude, and behaviour. Once we are aware of the true purpose of our being in the universe, our spiritual qualities help us in drawing spiritual strength to remain stable in all situations (Emotional Intelligence), be neutral towards negativity, truly understand others, and be at peace with not just one’s own self but with others and the world at large.

Spiritual intelligence includes both IQ (Intelligence Quotient) and EQ (Emotional Quotient) and even extends beyond these two quotients. Hence, when Spiritual Intelligence is applied in the workplace setting, it helps in aligning personal values with a clear sense of purpose, enhancing internal power to accept change and adapt newer perspectives in life. Thus, in simple words, it can be said that a happy and healthy mind is required to accomplish not only daily routine activities but also to achieve one’s ambition of life. And spiritual intelligence is important to attain that happy and happy state of mind.

Of late, the terms, Spiritual Intelligence and Emotional Intelligence have become buzzwords, specifically after the Covid-19 pandemic. Academic Institutions have started to take several initiatives for building awareness and managing the mental health-related issues of their students. Likewise, the spiritual awakening of young students has also risen to the top priorities of the Indian Government. The objective of National Education Policy 2020 is to transform the education landscape in India by embedding spiritual values and Emotional Intelligence in the curriculum, is one of the examples. The clear idea is the holistic development of the students by shifting their focus from ‘Mine to Thine’ and rebooting the materialistic society. The All-India Council for Technical Education has already started training the faculty members for teaching ‘Incorporating Universal Human Values in Education’. Spiritual education will build spiritual intelligence and the basis of this education should be the incorporation of morality and ethics in the design of the course structure. Morality, Ethics, and Integrity were always considered the foundation stones for a peaceful society\textsuperscript{[3]}, however, in modern times, SI can be taken as the new addition to this list as it ensures enhancement of cognitive thinking, compassionate and stable behaviour despite circumstances. Therefore, need was felt to analyse the relationship between spiritual intelligence, happiness level and academic intelligence to understand:

- Whether spiritual intelligence and happiness level are positively related?
- Whether spiritual intelligence and academic intelligence have any positive relation? And
- Whether happiness level and academic intelligence have any association with one another?

Addressing above research questions, the present work aims at analysing the relationship between Spiritual Intelligence, Happiness level and Academic Intelligence of students at the undergraduate level of
University of Delhi using the Oxford Happiness Questionnaire, SISRI24 Questionnaire, and Academic Achievement Assessment Tool. Moreover, an attempt has also been made to understand and examine the level of Academic Intelligence, Happiness and Spiritual Intelligence of the students understudy on an overall basis and in terms of their gender as well.

After the Introductory Section, the present paper is segregated into six Sections. Section II presents the Literature Review, Section III highlights the Research Objectives, and the Hypotheses are stated in Section IV. Section V discusses the Research Methodology. Section VI presents the Empirical Analysis including major findings and hypotheses testing. Finally, conclusion and implications, Limitations of the study and the Scope for further Research are yielded in Section VII.

2. Literature review

The word spiritual has its roots in the Latin word ‘Spiritus’, meaning “that gives life or vitality to a system”\(^1\). And Intelligence is commonly defined as one’s ability to contemplate, deliberate, and understand things rather than using instinct.

SI was considered as “the intelligence with which we address and solve problems of meaning and value, the intelligence with which we can place our actions and our lives in a wider, richer, meaning-giving context, the intelligence with which we can assess that one course of action or life-path is more meaningful than another”\(^4\). However, Wigglesworth\(^5\) has defined Spiritual Intelligence as “the ability to behave with Compassion and Wisdom while maintaining inner and outer peace (equanimity) regardless of the circumstances.”

As a result of the growing body of research on Spiritual Intelligence (SI) in particular the works of Amram\(^6\), Halama and Striženec\(^7\), Zohar and Marshall\(^4\), Noble\(^8\), Mayer\(^9\), multiple conceptualizations of this construct have emerged, specifically the one’s by Gardner\(^10\), Emmons\(^11\), Amram\(^6\), King\(^12\) and Griffiths\(^13\). Zohar\(^4\) has basically introduced the term spiritual intelligence.

Several pieces of research on adolescents have proved that Spiritual intelligence helps them in finding the meaning of life\(^14\) and it also contributes to the moral development and formation of a values system in adolescents. It also evidently predicts the emotional, social, and educational adaptation as well as the scholastic performance of adolescents\(^15\).

Numerous researches have proved that Spiritual intelligence has a significant positive impact on one’s health\(^16\). Research has also proved that there is a positive significant relationship between spiritual intelligence and mental health\(^17\). Spirituality also has a significant relationship with the self and others’ forgiveness\(^18\). The research conducted by Tajeri and Bahiray\(^19\) proved higher tolerance and less stress for more religious mothers. Spiritual Intelligence has a significant positive relationship with the quality of life of the students.

Different authors have also suggested various components of spiritual intelligence of a person. For instance, Emmons\(^11\) gave 5 components of SI: (1) Transcending capacity beyond the physical and material, (2) Experiential capacity for heightened states of consciousness, (3) Sanctifying abilities for everyday experiences, (4) Utilisation capacity for resources to solve problems and (5) Capacity to be virtuous.

On the other hand, Zohar\(^4\) recommended 12 components: (1) Self-Awareness, (2) Spontaneity, (3) Value-led, (4) Holism, (5) Compassion, (6) Celebration of diversity, (7) Field independence, (8) Humility, (9) An eye for detail and curiosity to understand the reasons behind things, (10) Ability to reframe, (11) Learning from mistakes and (12) Sense of calling.

Further, Amram\(^6\) also gave the following 7 components: (1) Consciousness, (2) Grace, (3) Meaning, (4)
Transcendence, (5) Truth, (6) Peaceful surrender to Self and (7) Inner Directedness.

Besides, King\cite{20} proposed four components of spiritual intelligence: (1) Critical Existential Thinking, (2) Personal Meaning Production, (3) Transcendental Awareness, and (4) Conscious State Expansion.

Most of the researchers talked about the components of SI but did not devise any instrument to measure it as they believed that it can’t be measured precisely, those who thought that it could be measured took no initiative to develop an instrument to measure it\cite{21} except Amram and Dryer\cite{22}, Wigglesworth\cite{23} and King who devised Spiritual Intelligence assessment instruments “ISIS”, “SQ21” and “SISRI24” respectively.

People with high overall spiritual intelligence depict good behaviours such as humanity, forgiveness, compassion, generosity, and love contended by Hashemi and Abbasi\cite{24}. Spiritual Intelligence is also seen as an adaptive mechanism to reduce and control stress in one’s life as compared to those who are less spiritually intelligent as suggested by Mohamad et al.\cite{25}. According to the authors, less stress in life may lead to a more calm and more peaceful life leading to overall happiness.

Spirituality is considered a facet of intelligence. Hence, it broadens the conception of the spirituality of psychologists, thereby associating it with logical cognitive processes like resolving problems encountered in life and achieving larger goals of life, largely spiritual intelligence has been perceived as a positive component of one’s personality\cite{21}. Since, people tend to understand the reason for their existence they make use of multiple levels of consciousness to various life problems and achieve personal and professional goals in one’s life\cite{26}.

Many researchers have proved that SI can strongly improve students’ engagement in the classroom (positive behaviour and involvement in classroom tasks and activities) and performance\cite{27}. Furthermore, empirical researches have displayed that the students’ engagement leads to diverse positive academic outcomes\cite{28} and is also correlated with their achievement, motivation, effective learning & success, interpersonal skills, psychosocial adjustment & safety, and classroom culture\cite{29–33}.

Spiritual intelligence includes both IQ (Intelligence Quotient) and EQ (Emotional Quotient) and even extends beyond these two quotients. Several researches were conducted to endorse that the Emotional Intelligence encompasses knowledge, skills, and abilities in emotive-communicative and professional-communicative aspects of students.\cite{34} Academic Institutions have started to take several initiatives for building awareness and managing the mental health-related issues of both the teachers and the students. Since, Psychological capital defines the mental resources and abilities of an individual to handle tough situations in life, thus, developing the same has risen to the top priorities of these institutions. Numerous researches were undertaken to confirm the relationship between the psychological capital of the teachers’ and how it enhances their professional happiness.\cite{35} However, limited studies could be found for identifying such relationships for the students of Higher education institutions.

Therefore, despite these studies, empirical research on the association of SI & students’ Academic Achievements, and SI & students’ Happiness is largely demanded. Hence, there was a dire need to understand whether spiritual intelligence can predict the happiness and academic intelligence of students in higher education institutions. The objective of this research is to study the role of spiritual intelligence in predicting the happiness and academic intelligence of students respectively by administering the Oxford Happiness Questionnaire, SISRI24 Questionnaire, and Academic Achievement Assessment Questionnaire (developed by the authors).

Moreover, although, many recent studies have focused on establishing the relationship between Spirituality, Happiness, and Success of students in different academic settings. While there has been much
focus on establishing this relationship from the milieu of the western world, very few studies have been known to take place in the Indian context. Hence, the present work attempts to fill the gap by analysing the relationship of spiritual intelligence with happiness level and academic intelligence of undergraduate students of University of Delhi, India.

3. Research objectives

In the light of aforesaid discussion as revealed by extensive literature review, the present paper is aimed at understanding the relationship between Spiritual Intelligence, Happiness, and Academic Intelligence of the students studying at Under Graduate level of University of Delhi. The specific objectives of carrying out this research have been mentioned as follows:

1) To ascertain the distinct levels of Spiritual Intelligence, Happiness, and Academic Intelligence of the students of University of Delhi understudy;
2) To analyse the relationship between Spiritual Intelligence and level of Happiness amongst the students of University of Delhi;
3) To explore and identify the association between Spiritual Intelligence and Academic Intelligence of the students of University of Delhi;
4) To examine the relationship between students’ Happiness level and their Academic Intelligence in the context of the University of Delhi; and
5) To understand and examine the relationship between the level of Spiritual Intelligence, Happiness, and Academic Intelligence level on the basis of the Gender of the participants, i.e., male and female.

4. Hypotheses

Based on the objectives mentioned above, the following hypotheses have been drawn:

H01: Students understudy cannot be classified in terms of distinct degrees of Spiritual Intelligence, Happiness level, and Academic Intelligence;

H02: There is no relationship between the Spiritual Intelligence and Happiness level of students of University of Delhi;

H03: There is no association between Spiritual Intelligence and Academic Intelligence of the students of University of Delhi;

H04: There is no association between Happiness level and Academic Intelligence of students of University of Delhi; and

H05: There is no difference in the association of Spiritual Intelligence, Happiness, and Academic Intelligence based on Gender of the students of University of Delhi.

5. Research methodology

This study is aimed at determining the level of Academic Performance, Happiness, and Spiritual Intelligence and examining the association between Spiritual Intelligence, Happiness, and Academic level of undergraduate students of University of Delhi. A structured questionnaire has been constructed to serve the purpose. To collect data, a questionnaire was sent to 300 students of the University of Delhi studying in the second and third year of graduation. Out of 300 questionnaires, 240 questionnaires were duly filled and submitted. Thereby, the analysis has been made based on the responses of 240 student participants which equals 80% response. The purpose of the research was duly explained to them and they were also encouraged to complete the questionnaires.
5.1. Research design

The present study has been conducted with the help of a structured questionnaire. Hence, no secondary information is collected for the purpose of the study. Moreover, responses are garnered using random as well as convenience sampling. Primary information is collected with help of a Google form. Three main variables under study include Spiritual Intelligence, Happiness, and Academic Intelligence. Accordingly, the questionnaire is comprised of three scales: the Oxford Happiness Questionnaire (to measure the level of happiness among students), SISRI 24 (to measure Spiritual Intelligence amongst students), and the Academic Achievement Assessment Tool (Self Designed by the authors for the purpose of this research). Responses have been analysed using simple aggregates, percentages, and calculating Pearson’s correlation coefficient. Respective correlations have been run between Academic Performance and Happiness level, Happiness and Spiritual Intelligence, and Spiritual Intelligence and Academic Performance. Hypotheses were tested and the results have been interpreted using SPSS and Microsoft Excel Worksheet.

5.2. Research instruments

This study used the Spiritual Intelligence Self-Report Inventory (SISRI 24) scale developed by King to measure a person’s level of Spiritual Intelligence based on the Spiritual Intelligence Model\[12,20\]. It has 4 dimensions, viz. existence of critical thinking, creation of personal meaning, passing of awareness, and development of consciousness. It contains 24 items and makes use of a 5-point Likert Scale (0—Not at all true of me, 1—Not very true of me, 2—Somewhat true of me, 3—Very true of me, 4—Completely true of me). The higher the scores or the values obtained for Spiritual Intelligence the higher is the level of Spiritual Intelligence. The reliability and validation of the questionnaire was carried out by King\[12\], initially the questionnaire comprised of 84-items that was eventually reduced to 24-items of study on 305 university students consisting of 231 females and 74 males. The alpha was obtained as 0.92.

Secondly, the Oxford Happiness scale was used for the current research as a broad measure of personal happiness. Argyle and Hills\[38\] were the psychologists who developed this questionnaire while working at Oxford University. This scale has been used worldwide and in cross-cultural contexts to compare students in multiple countries such as USA, UK, Canada and Australia\[39,40\], and has also been used in Taiwan as it forms the basis of the CHI (Chinese Happiness Inventory)\[41\]. 29 items Six-point Likert scale ranging from 1 = strongly disagree to 6 = strongly agree, is idle to be used on Undergraduate students (age ranged from 13 to 68 years). The higher values or scores represent greater happiness. The score falls in the range of 29–174. The Cronbach’s alpha of the questionnaire came out to be 0.91, and its demonstrated construct validity by correlation with measures of self-esteem, life regard index, and depression-happiness scale were found to be 0.81, 0.77, 0.90 respectively. The authors have used a tweaked version of this scale, converting it to a 5-point Likert scale falling in the range of 29–145.

Thirdly, the Academic Achievement Assessment Tool is a self-designed Questionnaire aimed at analysing the academic performance of the students. It is a fairly simple tool that collects multiple pieces of information pertaining to academic scores, awards & distinctions, research publications, etc. from the students. The academic performance of the students is measured in terms of CGPA, (a University of Delhi measure to assess the academic scores of students).

Thus, with the help of aforesaid three scales, the present analysis has been carried out.

5.3. Profile of respondents

The questionnaires were sent to 300 student participants belonging to different colleges of the University of Delhi pursuing distinct courses. Total of 240 respondents filled in the questionnaires. Out of which 120 were
female and 120 were male participants. Hence, responses are equally distributed in terms of gender. Most of the Respondents (65.5%) lie in the age group 18–20. The mean age of the respondent came out to be 20.23 years with a median age of 20. Profile of respondents in terms of age and gender has been shown with the help of Table 1 and Table 2 respectively as follows:

### Table 1. Profile of respondents by gender.

<table>
<thead>
<tr>
<th>Gender</th>
<th>Number of respondents</th>
<th>Percent (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Female</td>
<td>120</td>
<td>50.0</td>
</tr>
<tr>
<td>Male</td>
<td>120</td>
<td>50.0</td>
</tr>
<tr>
<td>Total</td>
<td>240</td>
<td>100.0</td>
</tr>
</tbody>
</table>

Source: Author’s Own Compilation.

### Table 2. Profile of respondents by age (in years).

<table>
<thead>
<tr>
<th>Age</th>
<th>Number of respondents</th>
<th>Percent (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>18–20</td>
<td>157</td>
<td>65.5</td>
</tr>
<tr>
<td>21–23</td>
<td>71</td>
<td>29.5</td>
</tr>
<tr>
<td>24–26</td>
<td>12</td>
<td>5.0</td>
</tr>
<tr>
<td>Total</td>
<td>240</td>
<td>100%</td>
</tr>
</tbody>
</table>

Source: Author’s Own Compilation.

Hence, respondents are equally distributed in terms of gender and age.

### 6. Empirical analysis

Empirical analysis has been conducted in three ways. Firstly, an attempt has been made to categorise the respondents in terms of their Academic level, Happiness, and Spiritual Intelligence. Secondly, an overall correlation is attempted to be judged between Spiritual Intelligence and Happiness, Happiness and Academic level, and Academic level and Spiritual Intelligence of all the respondents irrespective of their genders. Finally, correlation or association between their Spiritual Intelligence, Happiness, and Academic level has been attempted to be determined in terms of their genders specifically, i.e., males and females separately.

#### 6.1. Characteristics of respondents

Respondents have been categorised in terms of their Academic level, Happiness level, and level of Spiritual Intelligence using the Academic Achievement Assessment tool on the basis of CGPA awarded by University of Delhi, Oxford Happiness Scale, and SISRI-24 respectively.

#### 6.1.1. Academic level

The academic level of the student participants has been determined on the basis of the Cumulative Grade Point Average (CGPA) scored by them till the last semester examination passed by them from University of Delhi. In the present paper, CGPA and grade mentioned by University of Delhi have been clubbed to determine the Academic Score and Category respectively to better assess the Academic Performance of the respondents as shown in Table 3 given below.

### Table 3. Academic achievement assessment scale based on CGPA of University of Delhi categorisation.

<table>
<thead>
<tr>
<th>Academic score (CGPA)</th>
<th>Grade by University of Delhi</th>
<th>Author’s categorisation</th>
</tr>
</thead>
<tbody>
<tr>
<td>10</td>
<td>O: Outstanding</td>
<td>Excellent (9–10)</td>
</tr>
</tbody>
</table>
Hence, as per Academic Achievement Assessment Scale developed by authors; students scoring a CGPA between 9 and 10 are Excellent, between 7 and 8.99 are Good, 5 and 6.99 are Average, between 4 and 4.99 are Below Average and below 4 are Poor.

The respondent students have been categorised as regards to their Academic level with the help of Table 4 as follows:

Table 4. Academic level of respondents by CGPA.

<table>
<thead>
<tr>
<th>Academic Performance</th>
<th>Academic score (CGPA)</th>
<th>Number of respondents</th>
<th>Percent (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Excellent</td>
<td>9–10</td>
<td>48</td>
<td>20.0</td>
</tr>
<tr>
<td>Good</td>
<td>7–8.99</td>
<td>175</td>
<td>72.9</td>
</tr>
<tr>
<td>Average</td>
<td>5–6.99</td>
<td>16</td>
<td>6.7</td>
</tr>
<tr>
<td>Below Average</td>
<td>4–4.99</td>
<td>1</td>
<td>0.4</td>
</tr>
<tr>
<td>Poor</td>
<td>3–3.99</td>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>Total</td>
<td>-</td>
<td>240</td>
<td>100%</td>
</tr>
</tbody>
</table>

Source: Author’s own compilation.

Table 4 reveals that most of the student participants are Good in terms of their Academic Performance. Nearly, three-fourths (72.9%) of the respondents have attained CGPA (Cumulative Grade Point Average) between 7 and 8.99. Moreover, one-fifth (20%) of the student participants have scored a CGPA even more than 9 and hence, are Excellent. Only one of the students is falling in the below-average category.

Thus, more than 90% of the student participants are academically good or extremely good.

6.1.2. Happiness level

Oxford Happiness Scale has been adapted to measure the Happiness level of the respondents, i.e., the same statements are analysed using a Likert 5-point scale (strongly agree-5, agree-4, neutral-3, disagree-2 and strongly disagree-1). Hence, a respondent can secure a maximum score of 145 and the least score of 29, and the score of negative statements has been reversed for the purpose of assessment. Thus, students scoring between 116 and 145 are classified as Extremely Happy, between 87 and 115 as Very Happy, between 58 and 86 as Moderately Happy and between 29 and 57 as not Happy. Classification of participant students in terms of their Happiness level has been shown in Table 5 as follows:

Table 5. Happiness level of respondents.

<table>
<thead>
<tr>
<th>Level of happiness</th>
<th>Happiness score</th>
<th>Number of respondents</th>
<th>Percent (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>
Table 5 highlights that more than two-thirds (67.5%) of the participants are Very Happy and even one-eighth (12.5%) of the respondents are Extremely Happy. However, nearly one-fifth (18.7%) of them are Moderately Happy only while a very small segment of the participants (1.3%) seems to be Not Happy as per the result.

Thereby, exactly four-fifths (80%) of the students participating in the study are either Very Happy or Extremely Happy.

### 6.1.3. Spiritual intelligence level

SISRI-24 Scale has been adapted to assess the degree of Spiritual Intelligence of the student participants, i.e., the same statements are examined making use of a Likert 5-point scale (strongly agree-5, agree-4, neutral-3, disagree-2, and strongly disagree-1). Thereby, a respondent can obtain the highest score of 120 and lowest score of 24, and the score of negative statements is reversed for assessing the results. In this manner, students scoring between 96 and 120 are categorised as students with High SI, between 72 and 95 as students with Moderate SI, between 48 and 71 as students with Low SI, and between 24 and 47 as students with Negligible SI. On the basis of this classification, Table 6 given below indicates the spiritual intelligence level of the respondents.

<table>
<thead>
<tr>
<th>Category</th>
<th>Spiritual intelligence score</th>
<th>Number of respondents</th>
<th>Percent (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>High SI</td>
<td>96–120</td>
<td>44</td>
<td>18.3</td>
</tr>
<tr>
<td>Moderate SI</td>
<td>72–95</td>
<td>150</td>
<td>62.5</td>
</tr>
<tr>
<td>Low SI</td>
<td>48–71</td>
<td>38</td>
<td>15.9</td>
</tr>
<tr>
<td>Negligible SI</td>
<td>24–47</td>
<td>8</td>
<td>3.3</td>
</tr>
<tr>
<td>Total</td>
<td>-</td>
<td>240</td>
<td>100%</td>
</tr>
</tbody>
</table>

As indicated by Table 6, more than three-fifths (62.5%) of the student participants are Moderately Spiritually Intelligent. On the other hand, nearly, one-fifth (18.3%) of the participants are enjoying even a High Spiritual Intelligence level. Not even one-twentieth (3.3%) are having Negligible Spiritual Intelligence.

Thus, more than 4-fifths (80.8%) of the respondents are at least Moderately Spiritually Intelligent or Highly Spiritually Intelligent.

### 6.2. Correlation between academic level, happiness and spiritual intelligence

Pearson’s correlation coefficients have been estimated using SPSS to determine the degree of relationship between Academic Performance, Happiness and Spiritual Intelligence of the student participants and the same results have been presented in Table 7 as follows:

<table>
<thead>
<tr>
<th>Overall correlation</th>
<th>Overall correlation</th>
</tr>
</thead>
</table>

Source: Author’s Own Compilation.

Table 7. Overall corelation-academic performance, happiness and spiritual intelligence.

The Pearson correlation coefficient indicated by Table 7 between the Academic Performance and Happiness of student participants is 0.028 which is positive but not statistically significant at 1% significance level. On the other hand, the same is found to be negative but not at all significant in the case of Academic level and Spiritual Intelligence. But Pearson’s correlation coefficient is both positive and statistically significant between the Happiness and Spiritual level of students participating in the study. It is 0.388 at 1% significance level. Thereby, it can be stated that SI and Happiness are positively related and Happiness level has a positive relationship with Academic level though not significant. But there is no direct relationship between Spiritual Intelligence and the Academic level of student participants.

Hence, Spiritual Intelligence and Happiness level have a positive and significant relationship. Happy students tend to perform better although not proven statistically.

6.3. Correlation as per gender

Pearson’s correlation results indicating the relationship between Academic level, Happiness, and Spiritual Intelligence for male and female participants specifically are given in Table 8 as follows:

<table>
<thead>
<tr>
<th>Correlation as per gender</th>
<th>Academic score</th>
<th>Happiness score</th>
<th>Spiritual quotient</th>
</tr>
</thead>
<tbody>
<tr>
<td>Female Academic score</td>
<td>Pearson Correlation 1</td>
<td>0.041</td>
<td>0.097</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>0.654</td>
<td>0.360</td>
<td></td>
</tr>
<tr>
<td>N</td>
<td>120</td>
<td>120</td>
<td>120</td>
</tr>
<tr>
<td>Happiness score</td>
<td>Pearson Correlation</td>
<td>0.041</td>
<td>1</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>0.654</td>
<td>&lt; 0.001</td>
<td></td>
</tr>
<tr>
<td>N</td>
<td>120</td>
<td>120</td>
<td>120</td>
</tr>
<tr>
<td>Spiritual quotient</td>
<td>Pearson Correlation</td>
<td>0.097</td>
<td>0.446**</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>0.290</td>
<td>&lt; 0.001</td>
<td></td>
</tr>
<tr>
<td>N</td>
<td>120</td>
<td>120</td>
<td>120</td>
</tr>
<tr>
<td>Male Academic score</td>
<td>Pearson Correlation</td>
<td>1</td>
<td>0.041</td>
</tr>
<tr>
<td>Sig. (2-tailed)</td>
<td>0.657</td>
<td>0.478</td>
<td></td>
</tr>
<tr>
<td>N</td>
<td>120</td>
<td>120</td>
<td>120</td>
</tr>
<tr>
<td>Happiness score</td>
<td>Pearson Correlation</td>
<td>0.041</td>
<td>1</td>
</tr>
</tbody>
</table>

**. Correlation is significant at the 0.01 level (2-tailed).
Source: Author’s Own Using SPSS.
As per Table 8, Pearson’s correlation coefficients between Academic Performance and Happiness, Happiness and Spiritual Intelligence, and Spiritual Intelligence and Academic Performance for female respondents are 0.041, 0.446, and 0.097 respectively at 0.01 significance level. Hence, all three relationships understudy are found to be positive but statistically significant in the case of Happiness and Spiritual Intelligence only for female student participants. On the contrary, Pearson’s correlation coefficients for aforesaid relationships understudy as regards to male respondents come out to be 0.041, 0.338, and (−)0.065 respectively at 0.01 significance level. Once again, a positive and significant association has been observed between only Happiness level and Spiritual Intelligence for male participants also. However, in the case of males, an association between Academic Performance and Happiness level remains positive but turns out to be negative between Spiritual Intelligence and Academic Performance albeit insignificant.

Thus, correlation results for male student participants correspond to overall correlation results. Thereby, significant and positive relationship is identified between spiritual intelligence and happiness level of all the students. But There is low or no relationship between academic intelligence and spiritual intelligence of students. But, relationship between academic intelligence and happiness level is still positive though not significant.

### 6.4. Major findings

Aforementioned discussion reveals following major findings:

- The relationship between Spiritual Intelligence and Happiness is significant at 1% level of significance for both genders highlighting importance of including courses enhancing spiritual intelligence in students pursuing higher education.

- The positive association between Happiness & SI is higher amongst Female students than male students suggesting more focus and encouragement of male students.

- There is a positive relationship between Academic Success & Happiness for both genders indicating need of stress management courses and encouraging activities leading to happy and healthy state of mind of students like sports, music etc.

- There is a positive relationship between Academic Success & Spiritual Intelligence for female students. However, the said relationship is negative for male students but not significant. Thus, direct relationship between spiritual intelligence and academic intelligence is not ensured by this result for male students but role of SI is established in increasing happiness and hence, ensuring overall wellbeing of students pursuing higher education.

### 6.5. Hypotheses testing

In the light of empirical analysis carried out in the present paper; the hypothesis that the student participants cannot be classified in terms of the level of Academic Performance, Happiness, and Spiritual Intelligence is rejected. Moreover, the hypothesis that there is no significant relationship between Spiritual Intelligence and the Happiness level of students of University of Delhi is also refuted. However, significant
relationship is observed between neither the Academic Performance and Happiness level nor the Spiritual Intelligence and Academic level of the respondents. Therefore, the study fails to reject both hypotheses in this regard. Similarly, no significant difference has been seen in female and male student respondents, hence, the corresponding hypothesis cannot also be rejected.

7. Conclusion and implications

There is plethora of research on spiritual intelligence indicating its meaning and concept. But a very few studies are available devising tool of measuring it. Moreover, studies are also limited in terms of determining relationship between spiritual intelligence and happiness level of students pursuing higher education. However, few studies have identified this relationship in context of western world but a very limited studies are found in Indian context.

Identifying this gap in literature, the present paper aims at determining not only the level of Academic Performance, Happiness level, and Spiritual Intelligence quotient of selected undergraduate students of University of Delhi but also attempts to understand the nature and magnitude of association between Academic Performance and Happiness, Happiness, and Spiritual Intelligence and Spiritual Intelligence and Academic Performance of students of University of Delhi participating in the study both on an overall basis and on the basis of gender specifically, i.e., male and female. To serve this purpose, the modified SISRI scale developed by David King, the modified Oxford Happiness Scale, and the Academic Achievement Assessment Scale based on CGPA awarded by University of Delhi developed by authors to measure spiritual intelligence, happiness level, and academic performance respectively have been used. Empirical analysis of the responses has been done using Pearson’s correlation coefficient along with simple aggregates and percentages with the help of SPSS and Microsoft Excel. 240 students of the University of Delhi from different colleges including 120 males and 120 females participated in the study.

The results indicate that more than 90% of the students are Academically Good and more than 80% of the student participants are at least Very Happy and enjoying a Moderate level of Spiritual Intelligence at least. On the contrary, negligible number of students are Poor in Academics, Not Happy and with Negligible SI category.

A positive and significant relationship has been observed between Spiritual Intelligence and Happiness level of students both on an overall basis and in terms of their specific genders also. Positive association is also felt between Happiness and Academic Performance and vice-versa amongst students irrespective of their genders and considering their genders as well although not statistically significant. But, in terms of the relationship between Spiritual Intelligence and Academic Performance, results tend to be negative for males and on an overall basis also albeit not statistically significant again. However, in the case of female participants, all three relationships understudy come out to be positive either significantly or not.

Therefore, it can be concluded that Spiritual Intelligence and Happiness level are positively and significantly associated with one another. Moreover, Happiness and Academic Performance are also positively related though not significantly. It can also be said that Academic Performance and Spiritual Intelligence are also positively associated indirectly.

These findings are very important in highlighting the role of spiritual intelligence in ensuring happy and healthy state of mind of students learning at higher education institutes leading to their overall wellbeing. Thus, significance of courses and programmes ensuring spiritual intelligence or happy and healthy state of mind is also enlightened with the help of these findings. Moreover, youth is the future of any country and securing and safeguarding their present will certainly help in strengthening the future of the nation.
Thus, with this help of these findings, some operational suggestions or implications can be drawn as follows:

- Understanding the importance of spiritual intelligence, training of yoga and meditation should be imparted to kids right from their childhood by their parents or guardians;
- Similarly, attempts should be made to inculcate Spiritual Intelligence amongst students right from the very beginning of their education by the schools and educational institutions;
- Considering its importance, a separate paper on spiritual intelligence should be introduced in the course of not only school going students but also college going students;
- Parents, teachers, and higher authorities must understand their responsibility in the direction of uplifting level of spiritual intelligence amongst their kids, students and youth of the nation;
- Spiritual Intelligence programs should be included in the curriculum of students at all levels of education by the Government and higher authorities; and
- Similar studies should also be conducted in areas other than education.

Hence, NEP-2020 is a welcome step introduced by the Indian government in this regard. Moreover, such studies exploring relationship between spiritual intelligence and happiness level should be conducted involving other stakeholders not only from educational institutions but also from other institutions or organisations like hospitals and business or corporate world and many others.

7.1. Limitations

The sampling method used in the study is convenience sampling, which has its own inherent limitations. The sample size of 240 students is not large enough to be a fair representation of the total population. Use of more sophisticated statistical techniques and tools other than correlation and SPSS respectively has been another limitation of the study. The current study is based on the responses collected from the participants via questionnaire, in which the people have a general tendency to report their “most desirable behaviour” rather than the actual behaviour. Moreover, the present work lacks the participation of other stakeholders like teachers and administrators. Still, the authors believe that this study is a fair representation of the current scenario.

7.2. Scope for further research

The scale of the same study may be enhanced by targeting a greater number of students in different academic settings. The scope of the study may be enhanced by repeating it at the national level with multiple scales for measuring SI, Happiness, and Academic Intelligence. The present study mainly targets the students at the undergraduate level, however, the same may be repeated targeting students at the post-graduation level, research scholars, or school-going students. Moreover, other parties like parents, teachers, and higher education institutions, etc. can also be involved while conducting such a study. Similar analysis can also be made using rigorous statistical techniques other than simple Pearson’s correlation like regression and others. Furthermore, use of other sophisticated statistical tools can be made like R and Smart PLS etc. Qualitative analysis using N Vivo software can also be made conducting interviews of participants. Moreover, similar study can also be conducted in other fields other than education like hospitals and business world etc.

Author contributions

Conceptualization, SR, RG and GY; methodology, SR and RG; software, GY; validation, SR, RG and GY; formal analysis, SR; investigation, SR; resources, RG; data curation, GY; writing—original draft preparation, SR; writing—review and editing, RG; visualization, GY; supervision, SR; project administration, RG; funding acquisition, SR, RG and GY. All authors have read and agreed to the published version of the manuscript.
Compliance with ethical standards

The current study was completely funded by the authors of the paper from their personal funds. The procedures recommended by the institutional and/or national research committee, involving human participants have been strictly followed. Informed consent was obtained from all the participants included in the study and their responses will be kept confidential at all stages.

Conflict of interest

The authors declare no conflict of interest.

References

29. Chase PA, Warren DJA, Lerner RM. School Engagement, Academic Achievement, and Positive Youth Development. Promoting Positive Youth Development. Published online 2015: 57–70. doi: 10.1007/978-3-319-17166-1_4