6.1 PROBLEM:

The problem of study undertaken was-

“A comparative study of Attitude towards research, mental health and stress among J.R.F, NET and NON-NET research scholars in Universities situated in Uttar Pradesh.”

6.2 NEED OF THE STUDY:-

The problems of mental disorders and stress have been increasing tremendously for the last two decades all over word. The cases of mental disorder and stress are acquiring unusual dimensions every year, causing a great concern to educationist, psychologists, sociologists, social workers who are closely connected to the welfare of the individuals and society as a whole. In universities, many research scholars of various faculties are suffering from mental disorder and stress due to his own work Doctoral research supervision is one of the major avenues for sustaining student’s satisfaction with the program preparing student to be independent researchers and effectively initiating students’ into the academic community.

Attitude towards research consists one of the most important spheres of research scholars. A research scholar plays a central role in the research process of the Ph.D. program in university. In universities attitude of research towards his Ph.D. work is essential for the purpose of qualitative researches in India. Thus, qualitative research to some extent is result of qualitative Ph.D. program. Attitude of research scholars depends on a great extent on stress and mental health.
The world statistics reveal about 500 million students are believed to be suffering from neurosis and stress related and somato (psychological problems which present themselves as physical complaints).

These indications cover a wide variety of phenomenon. They include research scholars at work place who are excessively jealous of the status or imagined status of their siblings. Ph.D. student who hate research and are truants on every possible occasion can be added to the category of mentally ill. Expectations of scholars are even unrealistic and usually which inevitably lead to frustration. In these favourable and non-favourable conditions, research scholars feel highly stressful condition. With these conditions, attitude of research scholars about the Ph.D. program is very negative, many students are leaving their research work or they are unable to complete their work according to U.G.C. guidelines. In India, concerns have been expressed at various quarters on the poor quality of doctoral dissertation. Poor quality of dissertation points to the attitude and mental illness in students.

A perusal of related literature further reveals that only countable number of studies has been conducted in India and abroad on research scholars related to the dimensions undertaken in the present study VIZ, attitude, stress, mental health. However, no researcher has focussed on comparative study of above mentioned variables on the research scholars of various universities. Also, no one has attempted to use to these variable as possible predicative indicators of research scholars at various universities.

The present study is therefore, justified on the ground that it is the first plan of its kind, designed to explored the comparison of three independent factors viz attitudes towards
research, stress and mental health which might significantly contribute to the prediction of the research scholars of the Ph.D. Program.

That present study will be useful for the educators in general and various agencies which govern the universities in India particularly because the knowledge of comparison result of these factors under study will enable the educators and governing agencies to plan their Ph.D. guidelines keeping in this view these factors. The present study provides an insight to the supervisors to deal effectively with their research scholars so that they will be able to develop an understanding of the importance of attitude, stress, mental health and university climate. This understanding will also assist the supervisors to create a more affectionate, harmonious, warm, democratic and emotional atmosphere including good research & theses at university. And also, proper training and guidance may be given to the Ph.D. students accordingly. Moreover, on the basis of the finding of the study many agencies which govern Ph.D. program in various universities and every state in India may help scholars to modify their behaviour with regard to attitude, mental health and stress related problems.

Education administrators, curriculum planners, counsellors and guidance workers may also be benefited by the result of this study. The information yielded by this work may be of great practice use for the purpose of supervisors and guidance personnel’s. Researchers may also discover in it new challenges or new domains for further exploration. The present study is, thus, envisaged to serve a multidimensional cause in the vast filed of education.
In this context, it is highly necessary to investigate attitude towards research, stress and mental health of research scholars of various universities of Uttar Pradesh State.

6.3 REVIEW OF RELATED LITERATURE

The study of related literature implies locating, reading and evaluating reports of research as well as of the individual’s planned research project. As observed by J.W. Best, “Practically all human knowledge can be found in books and libraries. Unlike, other animals that must start a new with each generation man builds upon the accumulated and recorded knowledge of the past.”

The author further observed that if we fail to build his foundation of knowledge provided by the review of literature, our work is likely to be shallow and native and will often duplicate work that has already been done better by someone else. Carter V. Good thinks, “The key to the vast storehouse of published literature may open doors to sources of significant problems and explanatory hypothesis and provide helpful orientation for definition of the problem, background for selection of procedure and comparative data for interpretation of result. In order to be truly creative and original, one must read extensively and critically as a stimulus of thinking.

A brief account of preceding studies leads to the conclusion that there are many researches based on attitude in the field of higher education as well as general study research in the field of attitude in the field of higher education and in general study. Many studies were found on the attitude on the aspect of higher education specially related to students. Most of studies were conducted on the Undergraduate and postgraduate students towards the research. It is clearly observed in the study of Donald B. Black (Sep., 1960), Panda (1962),
A critical analysis of the above mentioned studies gave rise to certain substantive inquiries which needed to be highlighted and addressed for the sake of further investigation. Most of the studies which are conducted in abroad on the area of research attitude, it has come to light that research studies come up with contrary and mixed result. Most of the studies are conducted on the students who were enrolled in M.A. M.Sc. and M.Phil. programmes. Also in the area of stress, it had come to light that research studies have contrary and mixed results. These researches were conducted in relation to academic environment and academic achievement in the area of higher studies on scholars who were enrolled in any college. Also in the area of mental health, it has come to light that research studies found contrary and mixed results. It was clearly observed in the study of Bhan (1972), Revathi (2001), Ashwani Kumar Malik and Amita Saxena studied (2005), Chris Brown, David T. Dahlbeck and Lynette Sparkman-Barnes (April, 2006, 2007), Howard S. Adelman and Linda Taylor (June, 2006), Danirl Eisenberg, Ezra Golberstein and Sarah E. Gollust (Jul. 2007), Jareen Anne Rasen Thal, Jean Russell and Garry Thompson (2008), Rob Hongaardt, Gro Froyen and Olay Tangvald-Pedersen (March, 2013), Amar Abdull Kareem and Khuan Wai Bing (2014), Susan Antaramian (2015) etc. Many studies were conducted on the students of higher education on various aspects like personality development, counselling and future development. Thus, the present study differs from the previous studies already undertaken in the field of attitude towards research, stress and mental health. But no study was found on
the research scholars related to higher education. According of this review, no study is on 
the research scholars with the aspect of Attitude towards research. The review of studies 
highlighted the need for such a study in the light of inconclusive and conflicting findings. It 
also came to the notice of the researcher that the work so far done in these areas in India was 
inadequate and the area needs further exploration, especially, at research scholars.

6.4 OBJECTIVES OF THE STUDY:-

1- To study the attitude towards research of J.R.F, NET and NON-NET research 
scholars of Universities situated in Uttar Pradesh.
2- To compare the attitude towards research of J.R.F, NET and NON-NET research 
scholars of Universities situated in Uttar Pradesh.
3- To compare the attitude towards research among research scholars in various 
universities situated in Uttar Pradesh.
4- To compare the attitude towards research between male and female research scholars 
in various universities situated in Uttar Pradesh.
5- To study the level of mental health of JRF, NET and NON-NET research scholars in 
Universities situated in Uttar Pradesh.
6- To compare the mental health of JRE, NET and NON-NET research scholars of 
Universities of Uttar Pradesh
7- To compare the mental health among research scholars in various universities 
situated in Uttar Pradesh.
8- To compare the mental health between male and female research scholars in various 
universities situated in Uttar Pradesh.
9- To study the level of stress of JRF, NET and NON-NET research scholars of 
Universities situated in Uttar Pradesh.
10- To compare the stress of JRF, NET and Non-NET research scholars of Universities 
situated in Uttar Pradesh.
11- To compare the stress among research scholars in various universities situated in 
Uttar Pradesh.
12- To compare the stress between male and female research scholars in various universities situated in Uttar Pradesh.

6.5 HYPOTHESES OF THE STUDY:-

1- There is no difference in level of attitude towards research of J.R.F, NET and NON-NET research scholars of Universities situated in Uttar Pradesh.

2- There is no significant difference in attitude towards research among J.R.F, NET and NON-NET research scholars in Universities situated in Uttar Pradesh.

3- There is no significant difference in attitude towards research among research scholars in various universities situated in Uttar Pradesh.

4- There is no significant difference in attitude towards research between male and female research scholars in various universities situated in Uttar Pradesh.

5- There is no difference in level of mental health among J.R.F, NET and NON-NET research scholars in universities situated in Uttar Pradesh.

6- There is no significant difference in mental health among J.R.F, NET and NON-NET research scholars in University of Uttar Pradesh.

7- There is no significant difference in mental health among research scholars in various universities situated in Uttar Pradesh.

8- There is no significant difference in mental health between male and female research scholars in various universities situated in Uttar Pradesh.

9- There is no difference in level of stress among J.R.F, Net and NON-NET research scholars in Universities situated in Uttar Pradesh.

10- There is no significance difference in stress among J.R.F, NET and NON-NET research scholars in Universities situated in Uttar Pradesh.

11- There is no significant difference in stress among research scholars in various universities situated in Uttar Pradesh.

12- There is no significant difference in stress between male and female research scholars in various universities situated in Uttar Pradesh.
6.6 DEFINITIONS OF THE TERMS USED:

The following definitions of the term were used:-

**Attitude:-**

Attitudes are positive or negative feeling and values regarding an object, an event, a person or a country.

Kind defined attitude as follows:-

“When we have an attitude, we judge something along emotional dimensions, such as good or bad, harmful or beneficial, pleasant or unpleasant, important or unimportant.

Simpson defined attitude as follows:-

“Attitude is commonly defined as a predisposition to respond positively or negatively to things, people, place, events or ideas.”

**Mental Health:-**

“Mental health is the ability to adjust satisfactory to the various strains of the environment; we meet in life and mental hygiene as the means we take to assure this adjustment.

(Lewkan, 1949)

Mental health is described by WHO (2005) as:-
“A state of well being in which the individual realizes his or her own abilities can cope with the normal stress of life, can work productivity and fruitfully and is able to make a contribution to his or her Community.”

On the basis of various definitions, many sub-dimensions have evolved of mental health. Therefore, mental health can be defined in terms of sub dimensions like: Emotional stability, coverall adjustment, Autonomy, Security insecurity, Self-concept and intelligence.

**Stress:-**

The stress response is the body’s way of protecting oneself. When working properly stress helps to say focussed, energetic and alert.

“Stress is a reaction to an event the reaction being the generalized response of the body to the individual’s perception of the event, whether it is pleasant or unpleasant.

*(Hans Selye, 1977)*

Actually stress is a relational concept, it involutes factor in the environmental combined with factors in the individual.

Thus stress is a normal part of life and such producers of stress as physical exercise, various emotional states and creative activity are usually considered healthy prolonged and unwanted stress. However, it can have undesirable affects on mental and physical health, although reactions to such pressure can vary greatly among individuals.
Research Scholars:-

Research scholars means those students who are enrolled in Ph.D. program in various universities according to guidelines of University grant commission.

6.7 DELIMITATIONS:

Due to paucity of time resources and to make the study more meaningful, the study has been delimited in the following areas:-

1- As India is a vast country, it is difficult to cover the entire geographical area in a singly study like the proposed one. Therefore, the samples are being selected from various universities of Uttar Pradesh State.

2- This study is conducted on those research scholars who are enrolled in Ph.D. program in education faculty only.

3- This study is conducted on that University which was fully under the control of central and state Government only.

6.8 VARIABLES USED IN THE STUDY:-

1-Independent variables:-

1- Attitude
2- Mental Health
3- Stress

2- Dependent variables:-

1- NET,
2- Non-NET,
3- JRF
6.9 SELECTION OF SAMPLE:

The sample of JRF, NET and Non-NET research scholars of education department from the total population of male and female students in Ph.D. program in education of each university between 25 to 35 years of age was selected by using convenient sampling method. Institution wise number of sample units on whom tests were administered, is being mentioned in table blow-

<table>
<thead>
<tr>
<th></th>
<th>JRF</th>
<th>NET</th>
<th>NON-NET</th>
</tr>
</thead>
<tbody>
<tr>
<td>CU</td>
<td>(56)</td>
<td>(40)</td>
<td>(4)</td>
</tr>
<tr>
<td>SU</td>
<td>(43)</td>
<td>(53)</td>
<td>(24)</td>
</tr>
<tr>
<td>PU</td>
<td>(08)</td>
<td>(14)</td>
<td>(79)</td>
</tr>
<tr>
<td>M</td>
<td>(27)</td>
<td>(20)</td>
<td>(04)</td>
</tr>
<tr>
<td>F</td>
<td>(29)</td>
<td>(27)</td>
<td>(26)</td>
</tr>
<tr>
<td>M</td>
<td>(23)</td>
<td>(09)</td>
<td>(02)</td>
</tr>
<tr>
<td>F</td>
<td>(29)</td>
<td>(05)</td>
<td>(10)</td>
</tr>
<tr>
<td>M</td>
<td>(00)</td>
<td>(02)</td>
<td>(14)</td>
</tr>
<tr>
<td>F</td>
<td>(08)</td>
<td>(02)</td>
<td>(42)</td>
</tr>
<tr>
<td>M</td>
<td>(20)</td>
<td>(05)</td>
<td>(37)</td>
</tr>
</tbody>
</table>

Sample distribution of JRF, NET and Non-NET research scholars in Uttar Pradesh
*CU= Central University
*SU= State University
*PU= Private University
*M= Male research scholars
*F= Female research scholars

In the present study, the total sample of Ph.D. students of education departments from various Universities in Uttar Pradesh was taken. Out of total sample of 320, 160 Male research scholars and 160 female research scholars were selected. In total sample 107 JRF, 105 NET and 108 Non-NET research scholars were taken in Uttar Pradesh region.

6.10 SELECTION OF THE UNIVERSITIES:

To select the university from which target sample had been taken, first the investigator brought the list of Universities of Uttar Pradesh from the official website of University Grant Commotion (UGC). Only 12 universities were taken from Uttar Pradesh
district. These Universities were selected through convenience sampling method as per majority of types of research scholars, and male and female respondents of education department were selected by using convenient sampling.

<table>
<thead>
<tr>
<th>No</th>
<th>Name of University</th>
<th>Type</th>
<th>Region</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Dr. Ram Manohohar Lohiya, University, Faizabad</td>
<td>State University</td>
<td>U.P. East</td>
</tr>
<tr>
<td>2</td>
<td>Allahabad Central University, Allahabad</td>
<td>Central university</td>
<td></td>
</tr>
<tr>
<td>3</td>
<td>Banaras Hindu University, Varanasi</td>
<td>Central University</td>
<td></td>
</tr>
<tr>
<td>4</td>
<td>Meerut University, Meerut</td>
<td>State University</td>
<td>U.P. west</td>
</tr>
<tr>
<td>5</td>
<td>Teerthankar Mahaveer University, Moradabad</td>
<td>Private university</td>
<td></td>
</tr>
<tr>
<td>6</td>
<td>Subharti University</td>
<td>Private University</td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>Bundelkhand University</td>
<td>State University</td>
<td>U.P. South</td>
</tr>
<tr>
<td>8</td>
<td>Lucknow University, Lucknow</td>
<td>State University</td>
<td>U.P. Middle</td>
</tr>
<tr>
<td>9</td>
<td>CSJM University, Kanpur</td>
<td>State University</td>
<td></td>
</tr>
<tr>
<td>10</td>
<td>Amity University, Lucknow</td>
<td>Private University</td>
<td></td>
</tr>
<tr>
<td>11</td>
<td>Baba Saheb Bheem Rao Ambedkar University, Lucknow</td>
<td>Central University</td>
<td></td>
</tr>
<tr>
<td>12</td>
<td>Integral University, Lucknow</td>
<td>Private University</td>
<td></td>
</tr>
</tbody>
</table>

**Sample of University in Uttar Pradesh region**

**6.11 TOOLS USED IN THE STUDY**

**Attitude towards Research scale (ATRS):** This tool was developed by the researcher.

**Mental Health Inventory** by Dr. Jagdish and Dr. A.K. Srivastava.

**‘Personal Stress Source Inventory’** by Arun Kumar Singh

**6.12 STATISTICAL TECHNIQUES USED**

The statistics used according to objectives of the study was Mean and Standard Deviation, Variance, t-test and ANOVA was employed for the analysis of the data as comparison of two and three or more set of value is done.
6.13 FINDINGS

H₀: There is no difference in the level of attitude towards research among JRF, NET and NON-NET research scholars in Universities situated in Uttar Pradesh.

According to the table 4.1, it is clear that there is no difference in the level of attitude towards research among JRF, NET and Non-NET research scholars. The level of attitude of JRF, NET and NON-NET research scholars towards research is same as it is calculated by taking mean scores of JRF, NET and Non-NET research scholars of Universities. Judith A.Jellison and Donold M.Taylor (2007) found that there was no significant increase of attitudes in two different streams. Mo. Shahid Farooq and Sayad Zia Ullah Shah (2008) studied student’s attitude towards Maths. All the students of 10th grade of the secondary school of Lahore had same type of attitude towards Mathematics. Melhsan Lennic et. al. (2008) too, reported that no significant difference was found between groups, trends were seen overall among string teachers through descriptive statistics, factors analysis and interview. Support to findings may be sought from that Kaisar and Harting (2008) who came out with the conclusion that no significant difference had been found among nursing students towards research. The result shows that all nursing students had positive difficulties towards research and there was a difference across but it was presented by only Intzar Hussain Butt & Jahan Arashams (20013) who found that there was significant difference in the attitude with respect to the type of program and area of specialization. Thus, the hypothesis “There is no different in level of attitude towards research among JRF, NET and NET research scholars in University situated in Uttar Pradesh.” was ACCEPTED. It is suggested that all types of research scholars have equal attitude towards research because of
their equal work and procedure. The major reason for no difference in the level of attitude towards research among JRF, NET and Non-NET are common area of interest, proper guidelines given, understanding the advantages of the research, research being need of an hour, research oriented ideas, research improving the process and practice of education at every level.

**H⁰²: There is no significant difference in attitude towards research among JRF, NET and NET research scholars in Universities situated in Uttar Pradesh.**

It is revealed from table 4.2 that JRF, NET and NON-NET research scholars had equal attitude towards research. It was very interesting to say that the JRF, NET and NON-NET research scholars had no significant difference in the attitude towards research which was calculated using F-Test (ANOVA). Maheshwari and R.Haridas (2013) also found no significant difference in undergraduate students towards higher education. Intzar Husain Butt & Jahan Arashams (2013) found the same attitude with respect to the type of program and prior areas of specialization. Khalid Saleem, Butt and Jahir Khan (2014) too reported no significant difference towards research attitude and program fee in higher education institutes in Pakistan. Byrl G. Short and Michael Szabo (1974) too reported no significant difference in the attitude scores of the teacher when stratified on the other demographic variables. Jellison, and Donald M. Taylor (2007) found no significant difference in attitudes were found in two other studies with college students as participants. Lennic, Miami and Forid A.(2008) who came out with the conclusion that no significant difference was found between the groups, trends were seen overall among string teachers through descriptive statistics, factor analysis and interview. Fanny Honalt, Van Praag et.al (2015) found
different result and they found that students of Turkish and Moraccan decent was significantly higher than the students of Belgium decent for abstract attitudes and significantly lower for concrete attitudes. Thus, the hypothesis” There is no significant difference in attitude towards research among JRF, NET and NET research scholars in University situated in Uttar Pradesh.” was ACCEPTED. The major reasons for no significant difference in the attitude towards Research among JRF, NET and Non-NET are common engagement in research areas, understanding guidelines properly, understanding steps of research properly, accepting the advantages of the research, applying research in day-to-day life, necessitate research for career, acquainted completely with research concepts, serving society through research, research improves the process and practice of education at every level.

**H**$^0_3$: **There is no significant difference in attitude towards research among research scholars of various universities situated in Uttar Pradesh.**

It can be seen from the table 4.3.1 that the research scholars of Central Universities, State Universities and Private Universities have different attitude towards research. It is very interesting to say that attitudes of research scholars are different according to the status of Universities in Uttar Pradesh, which is found by using F-Test (ANNOVA). Al-Nashmy and Abdul Haleem (2015) also found that knowledge and attitude perceived towards scientific research is different according to types of institution in province of Saudi-Arabia, However, contrary results were reported by Iihand and Dede (2015) and Reghieh Ghasemi (2015) stated that type of University are not associated to attitudes towards medical science, research. Students should have favourable knowledge of research but their attitude to the
field was inadequate. Support to findings may be sought from that E. Alpay & R.Vrschoor
(2014) who came out to the conclusion that various types of institutions show the effect on
the attitudes of teaching researcher faculty towards the teaching and research. Thus, the
hypothesis that “There is no significant difference in attitude towards research among
research scholars of various universities situated in Uttar Pradesh” was REJECTED.
The mean score of an attitude towards research among research scholars of Central
Universities was maximum followed by Private Universities and then State Universities.
The major reasons found for the difference is infrastructure, placement issues, co-operative
environment and student-teacher relations that affects the personal and social life of the
researcher, which results in development of code of ethics among them. Their attitude
towards the usefulness of research for professional growth depends upon the above
mentioned factors. It is also found that the differences in process of fellowships, procedure
and organization climate in different universities have affected the attitude of researches.

H04: There is no significant difference in attitude towards research between male and
female research scholars of various universities situated in Uttar Pradesh.

Table 4.4 shows that the attitude towards research between male and female research
scholars differs significantly. It is remarkable to say that the male and female research
scholars have different attitude towards research which was found with the help of T-test.
The attitude towards research is found more among male researchers as compared to female
research scholars. Contradictory result were reported by Mo. Shahid Farooq & Sayed Zia
Ullah Shah (2003) who studied that the male and female students of 10th mathematics. It
means that gender differentiation has no impact on the student’s attitude towards
mathematics in Pakistan. Mehmet Ali (2011) also found that female research scholars have
higher attitude as compared to male research scholars towards educational research scale. Sadia Saukatet et.al. (2014) too reported that the male have significantly positive attitude towards research as compared to females. It is clear that male and female postgraduate students had different attitude towards research. The H₀ “There is no significant difference in attitude towards research between male and female research scholars of various universities situated in Uttar Pradesh.” was REJECTED. It is found that male candidates are more focused for their professional career so they have positive attitude towards research as compared to female researchers. The other reasons are females are engaged in social issues, favourable reservation policies for female candidate and relaxation in the procedure of Ph.D. Admissions, etc.

**H₀₅: There is no difference in Level of mental health among JRF, NET and NON-NET research scholars in Universities situated in Uttar Pradesh.**

It is clear from the table 4.5 that JRF, NET and NON-NET research scholars have different mental level. It is very surprising to say that mental levels are different according to the status of research scholars in Universities of Uttar Pradesh. It was found by using mean scores of each type of research scholar. Eisenberg, Golberstein and Gollust (2007) also found that mental health disorders are different according to their range in University student’s population. Joshanloo and Badi (2009) too reported that respondent with different level of mental health differed significantly. All in all, the result of the study coverage with prior finding was about the importance of big five personality traits in predicting wellbeing. Support to the findings may be sought from Susam Antaranian (2015), who came out with the result which indicated the difference in subjective wellbeing among college student
performance. Thus $H^0_{05}$ “there is no significant difference in level of mental health among JRF, NET and NON-NET research scholars in Universities of Uttar Pradesh.” was REJECTED. It is found that the mental health of JRF is higher as compared to NET and Non-NET research Scholars. The major reason was found that JRF researchers are getting fellowship from University Grant Commission which increases the confidence level and so they can take right decisions easily.

$H_06$: There is no significant difference in mental health among JRF, NET and NON-NET research scholars in Universities situated in Uttar Pradesh.

It is revealed from the table 4.6 that JRF, NET and NON-NET research scholars are different on the basis of measurement of mental health in the Universities of Uttar Pradesh. It is very remarkable to say that JRF, NET and NON-NET research scholars have different wellbeing which was found using F-test (ANNOVA). Support to the findings may be sought from Taylor and Adelman (2006) who found significant difference of mental health problems in school and public health. However, contradictory results were reported by Dharma Raj and Dr. Nitin Verma (2017), who stated that there was no significant difference with regard to physiological well being and physiological distress among the scholars of TISS and IIPS. Pand, Pradhan and Senepathy (1996) found that there was significant difference between secondary school teachers of government and private sectors. Support to the findings Sinha and Bhan (1978) who came out with the result that engineering boys were significantly superior in mental health than the University boys in Kurukshetra University. Thus, H0. “there is no significant difference in mental health between JRF, NET and NON-NET research scholars in Universities situated in Uttar Pradesh.” was REJECTED. The
major reason found that the confidence level and ability to take decision was much better in JRF researchers, low level of irritation, insecurity, feeling of dejection, etc. JRF researchers were able to perform task for longer duration due to financial back-up. JRF research scholars had wider perception towards life as compared to NET and Non-NET research scholars.

**H07: There is no significant difference in Mental Health among research scholars in various universities situated in Uttar Pradesh.**

It is revealed from the table 4.7 that the mental health of research scholars of Central, State and Private Universities are same. It is very surprising to say that the research scholars have same level of mental health in Central, State and Private Universities which was found using F-test (ANOVA). Support to our findings may be sought from Dharma Raj and Nitin Veram (2017) who came out with the result regarding the psychological well being and psychological distress among the scholar of TISS and IIPS. However, contradictory results were reported by Sinha and Bhan (1978) who stated that Engineering boys were significantly superior in mental health than University boys. Rasen Thal et.al (2008), too, reported that significant difference was found in mental health and well being of international students at an Australian University. Susan Antaramian (2015) found different mental health and well being between college student performances. The hypothesis “**There is no significant difference in Mental Health among research scholars in various universities situated in Uttar Pradesh**” was ACCEPTED. Status of University affected the mental health but because of the similarity in the process of research and procedure, the research scholars had equal mental health in Central, State and Private Universities. Moreover, it was found that the factors which were related with mental health and organizational climate were almost same in the all universities.
H08: There is no significant difference in Mental Health between male and female research scholars in various universities situated in Uttar Pradesh.

It is evident from the table 4.8 that male and female research scholars don’t differ on the measure of mental health in Uttar Pradesh. It is very remarkable to say that male and female research scholars in Uttar Pradesh have same level of mental health which was found using T-test. Contradictory results were found in the studies like, Thal, Russel and Thompson (2008) stated that age and gender had significant impact on students, well-being. Yorgason and zitzman (2011), too reported that male having fewer years in college were related to less knowledge of campus mental health service and females in college were predictive of higher service use. Robertson (2013) found that females in the total sample had lower freedom from anxiety than the males and were more expressed and had frequent concern than comparison standardization group. Dharma Raj and Nitin too reported that there also appeared significant different between male and female research scholars in life satisfaction domains in the comparative study of TISS and IIPS. However, supporting result was found by Poda, Pradhan and Senepaty (1996) who found that there was no significant difference between male and female secondary school teacher in their satisfaction and mental health.

Therefore, the hypothesis “There is no significant difference in Mental Health between male and female research scholars in various universities situated in Uttar Pradesh” is ACCEPTED. The major reason found for no significant differences are organizational policies, job demands and job control, the supervisor’s leadership style, perception of a career outside academic world, work-family interface and team decision making culture.
H09: There is no significant difference in level of stress among JRF, NET and NON-NET research scholars Universities situated in Uttar Pradesh.

It is clear from the table 4.9 that JRF, NET and NON-NET research scholars have same stress level towards research which was found using mean scores of each group of research scholars. It is because of their same work pressure and procedure. David Robotham & Clarree Jalian (2006) also found that the prevalence of stress is increasing among students studying in higher education but they belonged to same level of stress. However, contradictory results were reported by Suldo and Dedric (2013) who stated that ninth grade students reported more perceived stress than students in general education of higher level. Madhyastha, Lathe & Asha Kamth (2014) too reported that no differences were found in level of stress of medical students. All students reported stress and majority of them experienced stress to a moderate degree (50.5%).

Thus H0 “There is no significant difference in level of stress among JRF, NET and NON-NET research scholars in Universities situated in Uttar Pradesh.” is ACCEPEED. It was found that the same stress level among the research scholars is due to common working conditions.

H010: There is no significant difference in stress among JFR, NET and NON-NET research scholars in Universities situated in Uttar Pradesh.

It is revealed from the table 4.10 JRF, NET and NON-NET research scholars differs on the measure of stress. It is clear that JRF, NET and NON-NET research scholars had different stress level on their professional work which was found using f-test. David Robotham & Jalian (2006) also found the prevalence of stress is increasing among students, studying in
Higher education. Stress was different according to their stream, curriculum and process of examination also. Waghachavare & Dhunale et.al (2010) found that there was statistically significant association between stress and the field of education among dental, medical and engineering students respectively. They had different type of stress according to their stream. Support to the finding may be sought from that of M.Suldo and Elizabath dedrick (2013), who came out with the conclusion that ninth grade students in the IB program reported more perceived stress than the students in general education at levels higher. Thus H° “there is no significant difference in stress among JRF, NET and NON-NET research scholars in Universities of Uttar Pradesh.” was REJECTED. It was found that personal stress is more among NET Research scholars due to lack of fellowships and difficulties of rules and regulations to be followed. As JRF Research Scholars are financially secure during the Ph.D. tenure they are having low stress level as compared to NET Research Scholars. On the contrary, NON-NET research Scholars are job oriented parallel with the Ph.D. Program and they don’t worry about the time bound for the completion of research.

**H011: There is no significant difference in stress among research scholars of various Universities situated in Uttar Pradesh.**

It is evident from table 4.11 that stress level of research scholars is different according to the type of Universities in Uttar Pradesh. It is very interesting to say that status of Universities, stress of research scholars is significantly different, which was found using f-test (ANOVA). Support to finding may be sought from Wagh Chauare, Dhuale et.al. (2010), who came out with the conclusion that there was statistically significant association between stress and the field of education. Stress was found different among Dental, Medical and Engineering students respectively according to their stream and institutions. Ross et.al (1999) to reported
that result are suggestive as to the necessary components of a stress management program specific to the needs of college students as compared to universities. Therefore Hypothesis “There is no significant difference in stress among research scholars of various Universities situated in Uttar Pradesh” was REJECTED. It was found that higher level of stress was there among the research scholars of State University as compared to Central University and Private University. Major reasons found are the difference in infrastructure, placement issues, co-operative environment and student-teacher relations that affects the personal and social life of the researcher which results in development of code of ethics among them. It is also found that the differences in process of fellowships, procedure and organization climate in different universities has affected stress among researches.

**H012: There is no significant difference in stress between male and female research scholars of various Universities situated in Uttar Pradesh.**

It is clear from the table 4.12 that male and female research scholars differ on the measure of stress in Universities of Uttar Pradesh. It is surprising to say that male and female research scholars have different level of stress in Universities of Uttar Pradesh which, was found using t-test. Support to the findings may be sought from that of Reda Abouserie (1994), who came out with stress categories, respectively and there was significant difference between females and males students in both academic and life stress. Female students were more stressed than males. Greer (2008) also found perceived stress differ according to gender, Waghchaware et.al (2010) reported, stress was observed in 27.7% female and 20.4% male, the association with gender was statistically significant and found significant difference. Madhyastha, Labha & Kamat (2014) also found that female student had more academic performance stress. Thus, the hypothesis “There is no significant difference in stress
between male and female research scholars of various Universities situated in Uttar Pradesh.” is REJECTED. The major reasons found were variation in organizational policies, job stress and job control, the supervisor’s management style, insight of a career outside academic world, work-family interface and team decision making culture.

6. 14 EDUCATIONAL IMPLICATIONS:

The present study has dealt with the attitude towards research, mental health and stress in relationship to JRF, NET and Non-NET research scholars in universities of Uttar Pradesh. The study has thrown an adequate light on the various areas as under-

The findings of the study are likely to prove the importance of the psychologists, sociologists, researchers, administrators and supervisors/guide having attitude towards research in various research programs/projects in education discipline. The following are some of the educational implications arising out from the research.

1. Universities will come to know difference between type of research scholars who have high and low stress and positive and negative attitude. The high or low stress directly or indirectly affects the attitude and quality of researches. The method will be used to remove the difference of research effectiveness among scholars.

2. Research scholars of state universities have poor attitude towards research as compared to those of central and private universities. Care may be taken to find out the area of negative attitude formation and make better suitable with situations.

3. Male research scholars held more positive attitude towards research than the female research scholars. A possible reason for this finding may stem from the fact that the male assumed that the research is useful for their professional career, whereas,
females are usually supposed to look after domestic responsibilities so, they consider research subject as a degree requirement. Another reason of the positive attitude of males towards the research may be that they are more inclined towards mathematics, statistics and economics then the females.

4. The research scholars enrolled in Ph.D. program enrolled in private universities perceived research usefulness of life significantly more than those research scholars of state universities. Effect size of the difference was low. There is a dire need to revise the research program for developing positive attitude in the research scholars towards research. Significantly better perceived research usefulness of life was in private sector universities. In the current study may be attributing to the fact that in education discipline private sector is more qualitative. Conscious and competitive as compared to public sector. Their teachers have to demonstrate more dedication, commitment and persistent behavior to bring about change in the student’s attitude towards research.

5. The teachers, management persons and policy makers relating to education will come to know the effect of mental health and stress on research scholars in the different educational institutions and universities. The institution/universities were setup by the different agencies like UGC, ICSSR to achieve a goal of education. Step should have been taken to create an atmosphere where researchers are free from any kind of stress so that they are able to achieve the goal of research. Steps should have also should be taken to remove the lack of placement percentage of research scholars during Ph.D. programs in all universities/ research centers.
6. To remove the mental illness of research scholars, steps should be taken by different agencies UGC/ICSSR to arrange the different scholarships for the research scholars of all the universities and it should have been made mandatory for all the researches in humanities. Steps should have been taken to arrange various workshops of stress management in universities for the research scholars. Steps should taken by different educational agencies to appoint counsellor and create counseling cell in universities for research scholars.

7. Female research scholars have low mental health in comparison to male research scholars. Care should be taken to find out the area of poor mental health. Female research scholars also need to believe that accomplishment comes through their own action. This is often referred to as self-efficacy or self-determination.

8. Intelligence is also associated with attitude formation and mental health of research scholars. Hence, intelligence skills should be included among research scholars.

9. NET and Non NET research scholars have low mental health as compare to JRF students. Reduce the pressure on academic performance for example arranges fellowships for all research scholars, providing alternative educational routes.

10. Research scholars of state and private Universities have low mental health comparatively central university. The process and academic environment should be equal. Universities can encourage, faculty to imitate the activities that are sensitive to the diversity of research scholars.

11. The sample of the study is small through using purposive procedure is still small. A similar study on a large sample may be attempted before the result could be generalized to all the university like central, state and private universities, JRF, NET
and Non-NET, Deemed and regional universities’ perspective research scholars.

Mental health influences the study habits, Attitude of the prospective research scholars. So introducing of spiritual, mental, moral education and yoga education should be considered as compulsory part of curriculum. Refresher courses and workshops should be organized for research scholars to make them aware in the area of mental health. Research scholars, apart from of their pre-Ph.D. course work should be involving themselves in learning activities in limited days. It is recommended to enhance the number of working days part of their research activities with the establishment of counseling to improve research works and promotes sound mind.

12. Research scholars who have negative attitude towards research need to improve their reading, writing, way of communication and presentation skills for better quality of research work.

13. Efforts should be made to develop and enhance leadership skills among scholars. They should be made aware about their departmental responsibilities.

14. Measures should be taken to check whether the researchers are spending their fellowships for the right cause. They should feel moral obligations for spending it.

15. Researcher should try to maintain the copyright law and order while documenting the thesis. They should also know the limitations of the e-content. Researches should be well aware that their research cause no social and legal harm.

6.15: SUGGESTIONS FOR FURTHER STUDIES:

Research, though performed in an illustrated manner still there remains space for future areas to be discovered. This gives basis to work for future researches for the facts not yet explored and suggested areas of other studies.
1. Similar study can be conducted for two states in India.
2. The study can be performed in two streams in universities in Uttar Pradesh.
3. Other variables such as M.Ed. and M.Phil. Students can be used as respondents for Attitude towards research, mental health and stress.
4. This study is performed on Central, State and Private Universities of Uttar Pradesh, it can be performed for only central, state, private or deemed universities.
5. The present investigation may be extended to include some psychological factors viz locus of control, creativity, self-efficacy, academic adjustment and academic achievement in relation with mental health, attitude towards research and stress.
6. A comparative study may have been carried out the prospective research scholars studying in minority colleges, traditional universities, religious universities and private universities.
7. This study may be conducted between the faculty of self financed universities and state or central university in colleges, traditional universities, religious universities and private universities.
8. Comparative analysis of research scholars of universities can be performed on single variable also.
9. A preventive and counseling program may be designed to enhance the positive mental health and improve attitudes.
10. This study can be performed on research scholars of group of humanities and professional studies in professional institutes like IIM and IIT also.