## DECLARATION BY THE STUDENT

I SONIA RANI, declare that the thesis entitled "A study to assess the effectiveness of Nurse Led Cognitive Stimulation Program (NLCSP) on cognitive functions and quality of life among elderly in the selected rural community of Panipat, Haryana" is my own work conducted under the supervision of Dr. Jayanti Semwal (Supervisor) at Himalayan College of Nursing, Swami Rama Himalayan University, Jolly Grant, Dehradun and is approved by Departmental Research Committee of Nursing Sciences.

I further declare that to best of my knowledge the thesis does not contain any part of any work which has been submitted for the award of any degree either in this University or in any other University/Deemed University without proper citation.

### Besides this:

I have successfully completed the Course work of one semester as per UGC-Regulation-2016 norms.

I have also given a Pre-Ph.D. presentation and successfully incorporated the changes suggested on the basis of feedback and comments received.

I have also published one research paper in a journal from the research work of the thesis and presented two papers in conferences/Seminars and have produced evidence of the same in the form of the reprint of the paper and the presentation certificates.

Sonia Rani

DD20185010011

# CERTIFICATE

This is to certify that Sonia Rani in the department of Nursing of this University has fulfilled the requirements prescribed for the Ph.D. degree of the Swami Rama Himalayan University, Dehradun. The thesis entitled "A study to assess the effectiveness of Nurse Led Cognitive Stimulation Program (NLCSP) on cognitive functions and quality of life among elderly in the selected rural community of Panipat, Haryana" was carried out under my direct supervision. No part of thesis was submitted for the award of any degree or diploma prior to this date.

Approval was obtained from the university Ethics committee (SRHU/HIM/E-1/2019/Z) on 26<sup>th</sup> August, 2019. The letter is attached in my thesis as Appendix no. 1.

Dr. Jayanti Semwakithe, aruncukinang, badis

Prof. and HOD,

Community Medicine Department
Himalayan Institute of Medical Sciences
Swami Rama Himalayan University

# **CERTIFICATE FOR PLAGIARISM**

It is certified that Ph.D. thesis entitled "A study to assess the effectiveness of Nurse Led Cognitive Stimulation Program (NLCSP) on cognitive functions and quality of life among elderly in the selected rural community of Panipat, Haryana" by Sonia Rani has been examined by us. We undertake and declare that:

- a. This thesis has significant new work/knowledge as compared to already published or are under consideration to be published elsewhere. No sentence, equation, diagram, table, paragraph, or section has been copied verbatim from previous work unless it placed under quotation marks and duly referenced.
- b. The work presented is original and own work of author (i.e. there is no plagiarism). No ideas, processes, results or words of others have been presented as Author's own work.
- c. There is no fabrication of data or results which have been complied/analyzed.
- d. There is no falsification by manipulating research materials, equipment or processes, or changing or omitting data or results such that the research is not accurately represented in the research record.

e. The thesis has been checked using TURNITIN/software as suggested by UGC (copy of originality report attached).

Sonia Rani DD20185010011 PROFESSOR & HEAD

DepDim Tal of Community Me

Himalayan Institution DEHRADUN-248140

HiProfessor and HOD

Community Medicine Department

Himalayan Institute of Medical Sciences

Swami Rama Himalayan University

# A Study to Assess The Effectiveness of Nurse Led Cognitive Stimulation Program (NLCSP) on Cognitive Functions and Quality of Life Among Elderly in Selected Rural Community of Panipat, Haryana

by Sonia Rani

Submission date: 02-Mar-2023 09:34AM (UTC+0530)

Submission ID: 2026731657

File name: ally\_Corrected\_Thesis\_Sonia\_Rani\_2March\_22\_without\_Turnitin.docx (66.49M)

Word count: 30319 Character count: 171491

Opin

Department of Community Medicine Himalayan Institute of Medical Sciences Swam: Rame Himalayan University Swam: Rame Magai, Jolly Grant Dehradun-240020, Ottarakhand, India

Research & Ph.D. Cell Swami Rama Himalayan University Swami Ram Nagar, Doiwala Dehradun-248016

# A STUDY TO ASSESS THE EFFECTIVENESS OF NURSE LED COGNITIVE STIMULATION PROGRAM (NLCSP) ON COGNITIVE FUNCTIONS AND QUALITY OF LIFE AMONG ELDERLY IN THE SELECTED RURAL COMMUNITY OF PANIPAT, HARYANA



Thesis Submitted In Partial Fulfilment of the Award of Degree of Doctor of Philosophy In Nursing Sciences

SUBMITTED BY SONIA RANI SUPERVISOR DR. JAYANTI SEMWAL

Swami Rama Himalayan University Swami Ram Nagar, Jolly Grant, Dehradun

Year 2022

Horis

Department of Community Medicine Himalayar Institute of Medical Sciences Swami Rama Himalayan University Swami Ram Nagar Jolly Grant Dehradun-248010, Uttarakhand, India Research & Ph.D. Cell Swahi Rama Himalayan University Swami Ram Nagar, Doiwala Dehradun-248016 A Study to Assess The Effectiveness of Nurse Led Cognitive Stimulation Program (NLCSP) on Cognitive Functions and Quality of Life Among Elderly in Selected Rural Community of Paninat Harvana

SIMILA	7% RITY INDEX INTERNET SOURCES PUBLICATIONS	3% STUDENT PAPERS
PRIMARY	SOURCES	
1	www.jetir.org Internet Source	1%
2	repository-tnmgrmu.ac.in Internet Source	1%
3	www.researchgate.net Internet Source	1%
4	WWW.science.gov Internet Source	<1%
5	WWW.ijsr.net Internet Source	<1%
6	Submitted to University of Hong Kong Student Paper	<1%
7	WWW.Cureus.com Internet Source	<1%
8	www.jehp.net Internet Source	<1%

Department of Community Medicine Himalayar Institute of Medical Sciences Swami Rema Himalayar University Swami Rema Manar Jolij, Grant Dehradum-248010, Uttaraknand, India

Research & Ph.D. Cell Swarhi Rama Himalayan University Swami Ram Nagar, Doiwala Dehradun-248016

9	cheapjewelryus.com Internet Source	<1%
10	ijone.org Internet Source	<1%
11	worldwidescience.org	<1%
12	"Handbook of Active Ageing and Quality of Life", Springer Science and Business Media LLC, 2021	<1%
13	www.iosrjournals.org	<1%
14	"Posters", The Journal of Nutrition, Health and Aging, 2009 Publication	<1%
15	mdpi-res.com Internet Source	<1%
16	eprints.bournemouth.ac.uk Internet Source	<1%
17	Submitted to (school name not available) Student Paper	<1%
18	pubmed.ncbi.nlm.nih.gov Internet Source	<1%
19	www.valueresearchonline.com Internet Source	<1%
		200

(Jen)

Department of Community Medicine Himalayan Institute of Medical Sciences Swami Rama Himalayan University Swami Ram Himalayan University Swami Ram Himalayan University Dehradum-242016 Interastrand India Office: Incharge Research & Ph.D. Cell Swam Rama Himalayan University Swami Ram Nagar, Doiwala Dehradun-248016

20	repo.stikesicme-jbg.ac.id	<1%
21	www.studymode.com Internet Source	<1%
22	www.allresearchjournal.com Internet Source	<1%
23	www.frontiersin.org Internet Source	<1%
24	Submitted to M.M. International School, Mullana Student Paper	<1%
25	www.scielo.br Internet Source	<1%
26	elearning.medistra.ac.id Internet Source	<1%
27	Sepideh Taghavi, Pouya Farokhnezhad Afshar, Tooran Bagheri, Nasim Naderi, Ahmad Amin, Yasaman Khalili. "The Relationship Between Spiritual Health and Quality of Life of Heart Transplant Candidates", Journal of Religion and Health, 2019	<1%
28	mseduworld.blogspot.com Internet Source	<1%

Submitted to J S S University
Student Paper

Department of Community Medicine
Himaloyar institute of the second sources
Swam Rama Handbyon to good on
Swam Rama Handbyon to go Dehradun-248016, Uttaraknand, Indfff

Research & Ph.D. Cell Swam Rama Himalayan University Swami Ram Nagar, Doiwala Dehradun-248016

-		<1%
30	www.aeronline.org Internet Source	<1%
31	www.mdpi.com Internet Source	<1%
32	Soraya Mardanpour, Farideh Kazemi, Mansoureh Refaei, Rafat Bakht, Molod Hoseini. "Midwifery-oriented group counseling based on the GATHER approach on quality of life of women during the transition to menopause: a randomized controlled trial", Menopause, 2021	<1%
33	Y. Selvamani, P. Arokiasamy. "Height and quality of life among older adults (50+) in India: a cross-sectional study", Journal of Biosocial Science, 2021	<1%
34	WWW.ijcmsr.com Internet Source	<1%
35	www.researchpublish.com Internet Source	<1%
36	WWW.yumpu.com Internet Source	<1%

Jones

Lewisto

Department of Community Medicine
Himalovar, matitute of Medical Sciences
Swam, Roma Himaloyas, University
Swam, Roma Hagos Jolly Grant
Debrashm-228886, Hitarakhand, India

esearch & PL.D. Cell Swami Rama Himalayan University Swami Ram Nagar, Doiwala Dehradun-248016

37	"Principles and Practice of Geriatric Psychiatry", Wiley, 2002	<1%
38	Jeong-Mo Park, Mi-Won Kim, Hee-Young Shim. "Effects of a Multicomponent Cognitive Stimulation Program on Cognitive Function Improvement Among Elderly Women", Asian Nursing Research, 2019 Publication	<1%
39	Martin Orrell, Lauren A Yates, Alistair Burns, Ian Russell et al. "Individual Cognitive Stimulation Therapy for dementia (iCST): study protocol for a randomized controlled trial", Trials, 2012	<1%
40	innovpub.org Internet Source	<1%
41	WWW.Saiie.co.za Internet Source	<1%
42	Jeanne Bertuit, Marine Barrau, Sébastien Huet, Montserrat Rejano-Campo. "Intérêt des applications mobiles et internet dans la prise en charge de l'incontinence urinaire d'effort chez la femme", Progrès en Urologie, 2020	<1%
43	hdl.handle.net Internet Source	<1%
	Himalayan Institute of Negrosi Secures Swam Rama Himalayan University Swam Ram Rama Adio Grant Swami	fricer Incharge earch & Ph.D. Cell ma Himalayan University Ram Nagar, Doiwah ehradun-248016

44	mbnc.edu.in Internet Source	<1%
45	www.ijrrjournal.com Internet Source	<1%
46	link.springer.com Internet Source	<1%
47	Devita Elsa Arum Masruroh, Nur Isnaini. "The Effect of the Traditional Board Game "Dam-Daman" on the Elderly Cognitive Functions at the Elderly Integrated Health Center, Pegongsoran, Pemalang District, Pemalang", Proceedings Series on Health & Medical Sciences, 2022	<1%
	Publication	
48	Submitted to Hawaii Pacific University  Student Paper	<1%
49	Submitted to Hawaii Pacific University	<1% <1%

Himalayan is obtained in Medicine Himalayan is obtained in Medicine Swerner in the Medicine University warm Kama Himalayan University Swerner in the Medicine Grant Swerner in Medicine Grant Swerner in Medicine Grant Dehradun-248016 Ottoraknand, India Dehradun-248016

www.rguhs.ac.in Internet Source	<1%
1library.net Internet Source	<1%
Submitted to University of Salford Student Paper	<1%
ijop.net Internet Source	<1%
pesquisa.bvsalud.org Internet Source	<1%
research-information.bris.ac.uk Internet Source	<1%
www.wjgnet.com Internet Source	<1%
Submitted to EDMC Student Paper	<1%
Submitted to University of Sunderland Student Paper	<1%
Submitted to VIT University  Student Paper	<1%
journals.plos.org Internet Source	<1%
	1library.net Internet Source  Submitted to University of Salford Student Paper  ijop.net Internet Source  pesquisa.bvsalud.org Internet Source  research-information.bris.ac.uk Internet Source  Www.wjgnet.com Internet Source  Submitted to EDMC Student Paper  Submitted to University of Sunderland Student Paper  Submitted to VIT University Student Paper  journals.plos.org

71 www.thecitizen.in

Department of Community Medicine
Himstayon factitute of Medical Sciences
Swam Roma Himstayan University
Strom Rom Mago. Jolly Grant
Debradum-248016 Hitarakhand India

Volfficer Incharge Research & Ph.D. Cell Swami Rama Himalayan University Swami Ram Nagar, Dorwala Dehradun-24801

51	annalsofrscb.ro	<1%
52	digibug.ugr.es Internet Source	<1%
53	sydney.edu.au Internet Source	<1%
54	www.cambridge.org	<1%
55	"Carotenoid Production by Bacteria, Microalgae, and Fungi", Carotenoids, 2016.	<1%
56	Elham Shokouhi, Hashem Mohamadian, Fatemeh Babadi, Bahman Cheraghian, Marzieh Araban. "Improvement in oral health related quality of life among the elderly: a randomized controlled trial", BioPsychoSocial Medicine, 2019	<1%
57	Hitoshi Okamura. "chapter 24 Rehabilitation of Elderly People with Dementia", IGI Global, 2013 Publication	<1%
58	Submitted to Indian School of Mines Student Paper	<1%
59	Himalayan Institute of Medical Sciences Swam Rong Himalayan University Swam Rama	cer Incharge ch & Ph.D. Cell Himalayan University m Nagar, Doiwalb radun-248016

*		
	Internet Source	<1%
72	"Principles and Practice of Geriatric Psychiatry", Wiley, 2010	<1%
73	Rebecca Derbes, Jonathan Hakun, Daniel Elbich, Lindsay Master et al. "Design and Methods of the Mobile Assessment of Cognition, Environment, and Sleep (MACES) Study in Newly Diagnosed Breast Cancer Patients", Research Square Platform LLC, 2022	<1%
74	journalppw.com Internet Source	<1%
75	media.neliti.com Internet Source	<1%
76	www.isrctn.com Internet Source	<1%

Exclude quotes

On

Exclude matches

< 14 words

Exclude bibliography On

Handley is their of Mental Sciences Sweet to the refined yet University Sweet Rom Japon Jolly Grant Dehradun-248016, Uttarakhand, India

Swami Rama Himalayan University Swami Rama Himalayan University Swami Ram Nagar, Doiwals Sanradun-24801

# **CERTIFICATE OF VIVA-VOCE OF Ph.D. STUDENT**

A Study to Assess the Effectiveness of Nurse Led Cognitive Stimulation Program (NLCSP) On Cognitive Functions and Quality of Life Among Elderly in The Selected Rural Community of Panipat, Haryana

> Submitted by Sonia Rani DD20185010011

For the Degree of

Doctor of Philosophy

in

Nursing Sciences
is evaluated and approved by

SUPERVISOR EXAMINER

Undertaking for the submission of Ph.D. thesis

I solemnly declare that research work presented in the thesis entitled "A study to assess

the effectiveness of Nurse Led Cognitive Stimulation Program (NLCSP) on cognitive

functions and quality of life among elderly in the selected rural community of Panipat,

Haryana" is solely my research work with no significant contribution from any other

person. Small contribution/help wherever taken has been duly acknowledged and that

complete thesis has been written by me.

I understand the zero-tolerance policy of the SWAMI RAMA HIMALAYAN

UNIVERSITY (SRHU) towards plagiarism. Therefore, I as author of the above titled

thesis declare that no portion of my thesis has been plagiarized and any material used as

reference is properly referred/cited.

I undertake that material of the thesis submitted in hard bound and soft copy are same and

no alteration has been done. If found guilty in future, University may take any action

against me.

I undertake that if I am found guilty of any formal plagiarism in the above titled thesis

even after award of Ph.D. degree, the university reserves the rights to withdraw/revoke

my Ph.D. degree.

Name: Sonia Rani

Registration no: DD20185010011

Address: House no. 1314,

HUDA, Panipat (132103)

xvi

# **ACKNOWLEDGEMENTS**

"Gratitude can transform common days into thanks giving, turn routine job into joy and change ordinary opportunity in to blessings" (William Arthur Ward)

Life seems beautiful with success and achievement. In one's life success is not only result of their own hard work. This effort in my academic endeavor would not have been reality but for the constructive and purposeful support, guidance and encouragement rendered by a number of persons, whose help specially recognize through this printed page of dissertation in form of acknowledgement.

First and foremost, I would like to thank **God Almighty** for enlightening my way and for supporting me through all the ups and downs. His ways are different and perfect.

It is my proud and privilege to express my sincere thanks, deepest sense of gratitude and indebtedness to, **Dr. Renu Dhasmana**, Director Nursing, Himalayan College of Nursing, for facilitating me to conduct this project with necessary administrative permission.

I express my sincere thanks to **Dr. Vinita Kalra**, Officer In-charge, Research and Ph.D. Cell, Swami Rama Himalayan University for her guidance and support provided during the process of the study.

I take this opportunity to express my gratitude to **Dr. Sanchita Pugazhendi**, Professor and Principal, Himalayan College of Nursing for her continuous and valuable encouragement, motivation and support throughout the study project and also facilitating me with necessary administrative permission.

I would like to express my whole hearted, profound gratitude to my guide and motivator **Dr. Jayanti Semwal**, Professor and HOD, Community Medicine Department, Himalayan Institute of Medical Sciences, Swami Rama Himalayan University. I will ever remain grateful to my advisor for her valuable guidance and strong acumen. Her authoritative knowledge, intelligence, clinical expertise, mature judgment, and recommendations have given a clear sense of direction throughout the study and helped the present study up in a balanced way.

I would like to express my sincere gratitude to my mentor in this journey **Dr. Achala Gaikwad**, Associate Professor, IHBAS. It was impossible to complete the task of thesis writing without her proper assistance, encouragement, moral support and guidance.

Besides my guide I thank all members of **Ethical clearance committee**, of Himalayan College of Nursing with special regard to **Dr. Kathleen McKeehan**, Nursing Advisor, **Dr. Kamli Prakash**, Vice Principal, for their moral support, constructive criticism, and constant help throughout the study.

It is my honor to thank all the respected **Sarpanch** of the villages both for pilot and main study, for granting me permission and helping me to conduct my research study

and it also gives me great pleasure in acknowledging all the **Experts** for enlightening guidance, valuable suggestion and validating the research tools and training program used in my research study.

Grateful acknowledgement is express to **Dr. Rupali Shivalkar** (Psychiatrist) of Shanti Home Rehabilitation Center for giving permission for training and practicing cognitive stimulation program, and to **Mr. BK Aneja**, statistician, for clarification and guidance on certain aspects of statistical analysis of data.

Sincere thank goes to those **Elderly** who enthusiastically participated and showed keen interest in the study, without their co-operation it would have been impossible to complete the study.

I express my heartfelt gratitude to my sister-in-law Mrs. Partibha and Mrs. Sangeeta Sehrawat for her help in analysis part, and special thanks to my senior and my friend Ms. Simrat Kaur, Associate Prof., Mr. Dushyant Rana, NCC Head Galgotias University for continuous support throughout the study.

I would be simply failing in my duty if I forget to assign due importance to the internet portals which are now indispensable in any field of research and also our librarians and **Mr. Mahaveer Singh Panwar** and **Mr. Mohit Sharma**, Nursing Tutor in Teerthankar Mahaveer University for helping me to accomplish this project.

I would also like to show my gratitude to my **mother**, my source of inspiration, for her

love, understanding, and support during the long years of my education without her this

dream of mine could never have been realized.

Finally, my heart-felt gratitude is for all near and dear ones for their good wishes which

worked as catalyst in completion of this thesis.

"All may not be mentioned, but none is forgotten from the heart"

With bouquet of thanks

Sonia Rani

XX

# LIST OF TABLES

Table No.	Titles	Page
		No.
1.	Frequency and percentage distribution of samples according to their selected socio-demographic	77-78
2.	Qualitative analysis themes generated in group of elderly	80-81
3.	Qualitative analysis themes generated in group of elderly's care-giver	85
4.	Pre-test level of cognitive functions score in experimental and control groups	89
5.	Post-test level of cognitive functions score in experimental and control groups	90
6.	Comparison of pre and post-test level of cognitive functions score within and between groups of elderly in experimental and control group	91
7.	Comparison of cognitive functions score within and between the groups before and after Nurse Led Cognitive Stimulation Program by using r-ANOVA and independent t-test	92
8.	Pre-test level of quality of life score of elderly in experimental and control groups	94
9.	Post-test level of quality of life scores in experimental and control groups	95
10.	Comparison of pre and post-test level of quality of life score within and between groups of elderly in experimental and control group	96
11.	Comparison of score of quality of life within and between the groups before and after Nurse Led Cognitive Stimulation Program by using r-ANOVA and independent t-test	97
12.	Association between cognitive functions score with selected demographic variables	100-101
13.	Association of quality of life scores with socio-demographic variables	102-103

# LIST OF FIGURES

Figure No.	Figure Titles	Page No.
1	Modified conceptual framework based on Pander's Health Promotion model	19
2	Study site -District Panipat, Haryana	55
3	Schematic representation of sampling technique	59
4	Schematic representation of research methodology	62
5	Data collection procedure for phase II	63
6	Development of Nurse-Led Cognitive Stimulation Program	67
7	Scatter diagram showing correlation among score of cognitive function and quality of life	99

# LIST OF APPENDICES

I Letter seeking permission from Ethics Committee SRHU to conduct the study  II Letters seeking permission to conduct research study from concerned authorities: -  a. Permission from Deputy officer of District  b. Permission from District welfare officer  c. Permission for Pilot study  d. Permission for Main study	Page No. 141 142 143 44-145 46-147 148
II Letters seeking permission to conduct research study from concerned authorities: -  a. Permission from Deputy officer of District  b. Permission from District welfare officer  c. Permission for Pilot study d. Permission for Main study	142 143 44-145 46-147
Letters seeking permission to conduct research study from concerned authorities: -  a. Permission from Deputy officer of District  b. Permission from District welfare officer  c. Permission for Pilot study d. Permission for Main study	143 44-145 46-147
authorities: -  a. Permission from Deputy officer of District  b. Permission from District welfare officer  c. Permission for Pilot study  d. Permission for Main study	143 44-145 46-147
a. Permission from Deputy officer of District b. Permission from District welfare officer c. Permission for Pilot study d. Permission for Main study	143 44-145 46-147
b. Permission from District welfare officer c. Permission for Pilot study d. Permission for Main study	143 44-145 46-147
c. Permission for Pilot study d. Permission for Main study	44-145 46-147
d. Permission for Main study	46-147
,	
	148
III Certificate on cognitive stimulation program	
IV Permission of tool QOL-AD	149
V Informed consent (English and Hindi) 150	50-153
VI Certificate of validity of tool and intervention	154
VII Data collection tools (English and Hindi)	
	55-159
	60-163
Tool-c Mini Mental Status Examination scale	64-167
Tool-d Quality of life-Alzheimer disease scale	68-169
VIII Nurse Led Cognitive Stimulation Program 170	70-199
a. English b. Hindi	
IX Permission letter from samples to use their images in program booklet	201
X A booklet on cognitive stimulation activities 202	02-218
XI List of experts	219
XII List of formulas 220	20-221

XIII	Proof of published research papers	222-224
XIV	Proof of presented research papers	225-227
XV	Master Data Sheets	228-258

# LIST OF ABBREVATIONS

S.NO.	ABBREVATIONS	FULL FORM
1.	QOL	Quality of Life
2.	MMSE	Mini Mental Status Examination
3.	NLCSP	Nurse Led Cognitive Stimulation Program
4.	SD	Standard deviation
5.	%	Percentage
6.	Df	Degree of freedom
7.	N	Total number of samples
8.	ANOVA	Analysis of variance
9.	F-value	Value of ANOVA
10.	<u> </u>	Less than or equal to
11.	et al.	And all others
12.	P	Probability
13.	n	Frequency
14.	*	Significant
15.	CST	Cognitive Stimulation Therapy
16.	НРМ	Health Promotion Model
17.	NCD	Non-Communicable Diseases
18.	FGD	Focused Group Discussion
19.	QOL-AD	Quality of Life in Alzheimer's Disease Scale
20.	Mo CA	Montreal Cognitive Assessment Score
21.	NICE	National Institute for Health and Clinical Excellance