

DR. ANUPAM KHANNA (An Educator, Philosopher, Researcher, Author)

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- *Member of Reviewer Board of WORLD CONGRESS ON ENGINEERING (WCE) since WCE 2013.*
 - *Member of Reviewer Board of “International Conference of Applied and Engineering Mathematics”, held in London, U.K. during 3-5 July, 2013.*
 - *Member of Editorial Board & Reviewer Committee of International Journal of Scientific and Technology Research, FRANCE. (A Reputed International Journal of IJSTR Publication).*
 - *Member of Editorial Board & Reviewer Committee of International Journal of Engineering & Technology, Dubai, UAE. (A Reputed International Journal)*
 - *Member of Editorial Board & Reviewer Committee of International Journal of Applied Engineering Research & Development, INDIA. (A Reputed International Journal of Trans Stellar Publication)*
 - *Senior Editorial/ Advisory Board member in International Journal of Emerging Technology and Advanced Engineering, INDIA. (A Reputed International Journal)*
 - *Member of Editorial Board of International Journal of Computational Science & Mathematics, INDIA. (A Reputed International Journal)*
 - *Member of Editorial Board of International Journal of Applied Mathematics and Mechanics, INDIA. (A Reputed International Journal)*
 - *Member of Editorial Board of Advances in Applied Mathematical Analysis, INDIA. (A Reputed International Journal)*
 - *Life time member of Indian Mathematical Society, INDIA.*
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JOB EXPERIENCE

- Presently, Working as “Assistant Professor” in the Department of Mathematics, Maharishi Markandeshwar Engineering College, Maharishi Markandeshwar University, Mullana (Ambala).
- Member of Board of Studies (Mathematics) & Departmental Research Committee (Mathematics) in Maharishi Markandeshwar University, Mullana (Ambala).
- Worked as “Assistant Professor” in the Department of Mathematics, “Shobhit Institute Of Engineering and Technology”, (Affiliated to U.P.T.U., Lucknow), Gangoh, Saharanpur from 01/08/2006 to 04/02/2011.
- Associated with “ADARSH VIJENDRA INSTITUTE OF PHARMACEUTICAL SCIENCES”, (Affiliated to U.P.T.U., Lucknow) Saharanpur for Remedial Mathematics and Advanced Mathematics to B. Pharma. Students.
- Worked as H.O.D. Mathematics in S.V.S. Saharanpur from 04/12/2003 to 31/07/2006.

SUBJECTS COVERED**Post Graduate Level**

- *Ph.D. & M. Phil. Course Work*
- *Operation Research*
- *Complex Analysis*
- *Integral Equation*
- *Linear Algebra*
- *Integral Transforms*

Under Graduate Level

- *Engineering Mathematics-I, II, III*
- *Numerical Analysis*
- *Remedial Mathematics*
- *Advanced Mathematics*
- *Discrete Mathematics*
- *Industrial Management*
- *Polytechnic Mathematics*

EXECUTIVE SUMMARY

<u>RESEARCH EXPERIENCE</u> (After Ph.D.)	Seven Year[<i>see Annexure-1</i>]
<u>HIGHEST QUALIFICATION</u>	Ph.D. (Mathematics)[<i>see Annexure-2</i>]
<u>SPECIALIZATION</u>	ELASTIC VIBRATION (SOLID MECHANICS)
<u>BOOKS PUBLISHED</u>	[<i>see Annexure 3</i>]
<u>RESEARCH PUBLICATIONS</u>	<u>Papers in International Journals</u> = 26 [<i>see Annexure-4</i>]
<u>CONFERENCES/SEMINARS</u> <u>WORKSHOP</u>	<u>Papers in Conferences</u> =27 [<i>see Annexure-5</i>]
<u>STUDENT RESEARCH</u> (M.Phil. & Ph.D.)	[<i>see Annexure-6</i>]
<u>AWARDS/GOLD MEDALS</u>	[<i>see Annexure-7</i>]
<u>SPECIAL ACHIEVEMENTS</u>	[<i>see Annexure-8</i>]
<u>EXTRA CURRICULAR</u> <u>ACTIVITIES</u>	[<i>see Annexure-9</i>]
<u>TEACHING METHODOLOGY</u>	[<i>see Annexure-10</i>]
<u>RESEARCH PLAN</u> (FOR NEXT FIVE YEARS)	[<i>see Annexure-11</i>]
<u>ADMINISTRATIVE</u> <u>EXPERIENCE</u>	[<i>see Annexure-12</i>]
<u>REFREES</u>	[<i>see Annexure-13</i>]
<u>PERSONAL INFORMATION</u>	[<i>see Annexure-14</i>]

Date:

Place:

(Dr.Anupam Khanna)

Annexure -1**RESEARCH EXPERIENCE**

Started research in Mathematics in the field of Vibration of Plates i.e. “Some Vibration Problems Of Visco-Elastic Plate Of Variable Thickness In Two Directions” from 05/12/2002.

We are very familiar with the word “VIBRATION” which is widely used in various field of engineering. Due to Vibration in system, the efficiency or work power of the system reduces day by day. In modern technology, engineers are tried to know about few modes of vibration before finalizing a design of structure. In order to fulfill the requirements, the plates of variable thickness are extensively used to get desirability and durability. It provides two fold requirement i.e. safety and economy. This work is carried out for a visco-elastic rectangular plate of an Alloy of Aluminium named “DURALIUM” which is widely used in the field of aeronautical engineering, aerospace, earth quake resistant structure etc. Degree of Ph.D. is awarded in 09/09/2006.

Annexure-2**HIGHEST QUALIFICATION**

DEGREE/ EXAM PASSED	DIVISON WITH %	YEAR	BOARD/UNIV	SUBJECT(S)	SPECIALIZATION
Ph.D.	---	2006	C.C.S. Univ.Meerut	Mathematics	Elastic Vibration
M.Sc.	Ist(81.5)	2002	C.C.S. Univ.,Meerut	Mathematics	Applied Math., Operation Research
B.Sc.	Ist(76.5)	2000	C.C.S. Univ.,Meerut	Physics, Chem., Math	-----
12 th	Ist(73.4)	1997	U. P. Board	Physics, Chem., Math	Distinction in Phy., Chem.& Math
10 th	Ist(69.9)	1995	U. P. Board	Physics, Chem., Math	Distinction in Math & Hindi

Annexure 3**BOOKS PUBLISHED**

1. “Some Mathematical Models on Vibrational Behaviour of Plates” is published in Lambert Academic Publishing House, Germany in 2012.
2. “Vibrational Characteristics of Square Plate with Thickness Variability” is published in Lambert Academic Publishing House, Germany in 2012.

Annexure-4**Papers in International Journals**

<u>S.No.</u>	<u>Year of Pub.</u>	<u>Title of paper</u>	<u>Name of the Journal, Volume/page no.</u>	<u>Name of the publisher</u>
<u>1</u>	<u>2012</u>	Natural vibration of visco-elastic plate of varying thickness with thermal effect	<u>Accepted</u> TKJSE, Taiwan	Tamkang Univ., Taiwan
<u>2</u>	<u>2012</u>	Free vibration analysis of C-C-C-C visco-elastic square plate with varying thickness	<u>Accepted</u> AJMS, USA	Scientific and Academic Publishing
<u>3</u>	<u>2012</u>	Effect of varying poisson ratio on thermally induced vibrations of non-homogeneous rectangular plate	<u>Accepted</u> IJST, India	IJST, Publication
<u>4</u>	May, 2012	Vibrations of non-homogeneous visco-elastic plate with varying thickness and density	International journal of emerging trends in Engineering and Development, issue2, vol.4.	RS Publication
<u>5</u>	May, 2012	Mechanical vibration of visco-elastic plate with thickness variation	International Journal of Applied Mathematical Research, Vol.1.,No.(2), pp:150-158	Science Publishing Corporation
<u>6</u>	April, 2012	Effect of thermal gradient and thickness variation on vibration of visco-elastic plate	International journal of Scientific and technology research, Issue 3, vol.1, pp:58-60	
<u>7</u>	April, 2012	A computational prediction on vibration of square plate by varying thickness with bi-dimensional thermal effect	International journal of emerging trends in Engineering and Development, issue2, vol.3.	RS Publication
<u>8</u>	April, 2012	Vibrational analysis of visco-elastic rectangular plate with varying thickness	International journal of emerging trends in Engineering & Development, issue2, vol.3, pp:191-196	RS Publication
<u>9</u>	2012	Effect of Thermal Gradient on Vibration of Visco-Elastic Plate with Thickness Variation	American Journal of Computational and Applied Mathematics, 2(1),pp:34-36.	<u>Scientific and Academic Publishing</u>

<u>10</u>	2012	Vibration characterization of c-c-c-c visco-elastic square plate with varying temperature	International Journal of Research in Engineering and Applied Sciences, Vol 2 (2), pp:1754-1760	<u>Euro Asia research and Development Association</u>
<u>11</u>	2011	Analysis of Free Vibrations of Visco-Elastic Square Plate of Variable Thickness With Temperature Effect	International journal of applied engineering research, india, (vol.2, no.2)	Integrated Publishing Association
<u>12</u>	2011	Thermally Induced Vibration of Non-Homogeneous Visco-Elastic Plate of Variable Thickness	Advances in physics theories and applications, USA,(Vol.1, No.1, pp:1-5)	International Inst. Of Science & Technical Education
<u>13</u>	2011	Vibration Analysis of Visco-Elastic Square Plate of Variable Thickness with Thermal Gradient	International journal of engineering and applied sciences ,Vol.3,No.4,pp:1-6	<i>Turkish Academy of Sciences</i>
<u>14</u>	2011	Bi-Parabolic Thermal Effect on Vibration of Visco-Elastic Square Plate	Journal of applied mathematics and bioinformatics", Greece, (Vol.1, No.2, pp: 39-48)	International Scientific Press
<u>15</u>	2011	Theoretical Model on Vibration of Visco-elastic square plate with thermal effect	International journal of applied engineering research", India, (Vol.6, No.18, pp:3143-3145)	Research India Publication
<u>16</u>	2011	Vibration Characteristics of Non-Homogeneous Visco-Elastic Square Plate	Advances in physics theories and applications, USA,(Vol.2, No.1, pp:1-6)	International Inst. Of Science & Technical Education
<u>17</u>	2011	Vibration of Non-homogenous Visco-Elastic Square Plate of Variable Thickness in Both Directions With Thermal effect	Innovative system design and engineering", U.S.A., (Vol.2, No.3,pp:128-134)	International Inst. Of Science & Technical Education
<u>18</u>	2011	Study of free Vibration of Visco-Elastic Square Plate of Variable Thickness with Thermal Effect	Innovative system design and engineering", U.S.A., (Vol.2, No.4,pp:85-90)	International Inst. Of Science & Technical Education
<u>19</u>	2011	Thermal Effect on Vibration of Visco-Elastic Square Plate with Bi-Directional Varying Thickness	International journal of applied engineering research", India, (Vol.6, No.18, pp:3150-3152)	Research India Publication

<u>20</u>	2011	Thermal Effect On Vibrations Of Parallelogram Plate Of Bi-Direction Linearly Varying Thickness	APPLIED MATHEMATICS, (Vol.2, pp: 33-38)	<i>Hindawi Publishing Corporation</i>
<u>21</u>	2010	Thermal Effect on Vibrations Of Parallelogram Plate Of Linearly Varying Thickness	Advanced Studies Theoretical Physics, Vol.4, No.17, pp: 817-826	<i>Hikari Ltd</i>
<u>23</u>	2010	Vibration Analysis of Visco-Elastic Rectangular Plate With Thickness Varies Linearly In One and Parabolically In Other Direction"	Advanced Studies Theoretical Physics, Vol.4, No.15, pp:743-758	<i>Hikari Ltd</i>
<u>24</u>	2009	Vibration Of Visco-Elastic Rectangular Plate With Exponentially Varying Thickness In Both Directions	Journal of Theoretical and Applied Mechanics", (Poland),(Vol.47,No. 2, pp: 457-471)	<i>PTMTS</i>
<u>25</u>	2008	Vibration Of Clamped Visco-Elastic Rectangular Plate With Parabolic Thickness Variations	Journal of shock and vibration", U.S.A,(Vol. 15, No.6, pp: 713-723)	<i>IOS Press</i>
<u>26</u>	2007	Vibration Of Visco-Elastic Rectangular Plate With Linearly Thickness Variation In Both Directions"	Journal of sound and vibration", U.K., (Vol. 301, pp: 450-457)	<i>Elsevier</i>

Annexure 5:**Papers in Indian Conferences**

S.No.	Date / Year	Title of paper	Name & place of conference	National/ International
1	8-9 th June, 2012	Natural vibration of visco-elastic plate with bidirectional thickness variation	Ist national conference on Innovative Ideas in Engg. & Management, Manav Bharti Univ., Solan	National
2	13 th April, 2012	Effect of varying poisson,s ratio on vibration of visco-elastic rectangular plate with thermal effect	II National conference on Emerging Trends in Engineering, Geeta Engg. College, Panipat, Haryana	National

3	24-25 th , March, 2012	A mathematical model on free vibration of visco-elastic plate	Recent Innovations in engineering & Technology, 2012	National
4	17 th March, 2012	Vibrational Characteristics of Visco-Elastic C-C-C-C square Plate with Varying Thickness	Current Challenges and Opportunities in Tech. & Management, D.B.G.I.. Saharanpur	National
5	17 th March, 2012	Two dimensional thermal effect on vibrations of visco-elastic square plate	Application of Mathematics in Engineering Sciences, N.C.College, Panipat	National
6	17 th March, 2012	Thermo-vibrational behavior of non-homogeneous visco-elastic plate with continuously varying poisson's ratio	Application of Mathematics in Engineering Sciences, N.C.College, Panipat	National
7	17 th March, 2012	A mathematical model on vibration of non-homogeneous parallelogramic plate with varying temperature and density	Application of Mathematics in Engineering Sciences, N.C.College, Panipat	National
8	25-26 th , Feb 2012	"Effect of temperature on vibration of visco-elastic plate"	Recent Advances in Material Sciences, Dyal singh college, karnal, Haryana	National
9	18 th Feb, 2012	Theoretical model on visco-elastic rectangular plate (c-c-c-c) with varying density and temperature	Recent Advances in Applied Mathematics, ITM university, gurgaon, Punjab, (sponsored by Dept. of Science and Technolog, India)	National
10	7-9 th Feb, 2012	"Study on c-c-c-c non-homogeneous parallelogramic plate with two dimensional temperature variation"	Science in the 21 st Century, 15 th Punjab national congress GNDU, Amritsar	National
11	4-6 th Feb, 2012	Study on Vibration Behavior of Visco-Elastic Plate with continuously varying thickness	Emerging Trends in Mathematics & Its Applications, D.A.V. College, Jalandhar	National

12	29 th January, 2012	Vibration characterization of c-c-c-c visco-elastic square plate with varying temperature	Int. conference on Competitiveness & Innovativeness in Engg. Management and Information Tech., MAIMT, Jagadhary	International
13	21 st , January-2012	Analysis of free vibration of C-C-C-C visco-elastic square plate with varying temperature.	National conference on Numerical & Mathematical Modelling in Electrical Engg. & Applied Sciences, Poornima College of Engineering, Jaipur (Rajasthan)	National
14	16-17 Dec. 2011	“A computational prediction on free vibration of visco-elastic square plate of variable thickness with temperature effect	Sant longowal institute of engineering & technology, punjab (India)	National
15	4-5 Nov, 2011	“thermal effect on vibration of clamped visco-elastic square plate with parabolic thickness variation	Sant longowal institute of engineering & technology, Punjab (India)	National
16	20-22th Oct, 2011	Thermal effect on vibration of visco-elastic square plate with bi-directional varying thickness	Emerging Trends In Engg & Technology, GIMT, Kurukshetra	International
17	20-22th Oct, 2011	Thermal effect on vibration of non-homogeneous square plate having linearly varying thickness	Emerging Trends In Engg & Technology, GIMT, Kurukshetra	International
18	8-9, Sept, 2011	“Effect of thermal gradient on vibration of visco-elastic rhombic plate	Amity University Haryana, Gurgaon (India)	National
19	8-9, Sept, 2011	Vibration analysis of visco-elastic plate with thermal effect	Amity University Haryana, Gurgaon (India)	National

20	5-6 Sept. 2011	“thermal effect on natural frequencies of a square plate with varying thickness	Geeta institute of management and technology, panipat, haryana (India).	National
21	14-16 June, 2011	“Effect of thermal gradient on visco-elastic square plate with varying thickness in two directions”	CONIAPS-13, Univ. of petroleum and energy studies in dehradun, uttarakhand (india)	International
22	14-16 June, 2011	A computational prediction of two dimensional thermal effect on vibration of visco-elastic square plate of variable thickness”	CONIAPS-13, Univ. of petroleum and energy studies in dehradun, uttarakhand (india)	International
23	7-8 May 2011	Theoretical analysis on vibration of visco-elastic plate with varying thickness	Sunder deep engineering college, Ghaziabad (UP).	National
24	25-26 Feb., 2011	Effect of variable thickness on vibration of visco-elastic square plate	D.A.V. Degree College, Bhatinda (Punjab)	National
25	11, April 2010	Role of mathematics in daily life & its application in management & technology	SIET, Shamali, UP	National
26	28-29 Nov, 2009	“Effect of taper parameters on vibration of visco-elastic square plate of variable thickness”	Recent trends in Management, Tech. and Environment, S. D. College of engg & tech. Mzff, UP.	International
27	07-09, August 2009	A computational prediction on vibration of visco-elastic iso-tropic rectangular plates of variable thickness	KIET, Ghaziabad, UP	National

Annexure-6**Student's Research**

Ph.D. Two students are registered for Ph.D. under my supervision in M.M. University, Mullana and their work is going in positive direction.

M.Phil.

S.No.	Name of Student	Year	Title of thesis	Co-Supervisors (If any)
1	Ashish Kumar Sharma	2011	Effect of Thermal Gradient on Vibration of Visco-Elastic Square Plate of Variable Thickness	No
2	Meenu Bhatia	2011	Two Dimensional Thermal Effect on Vibration of Visco-Elastic Square Plate of Varying Thickness	No
3	Neelam Sharma	2012	Like to be submit	No

Annexure-7**AWARDS/GOLD MEDALS**

Awarded with Three Gold Medals in M.Sc. (Mathematics), 2002 for Securing ***First Rank in the Merit List of Ch. Charan Singh University, Meerut*** i.e.

1. "**Dr. Madan Mohan Gold Medal**" for securing Highest Marks in Mathematics (2002) in Ch. Charan Singh University, Meerut (UP) given by Governor of U.P. "Shri.T.V. Rajeswar" with the Presence of the Central Home Minister "Shri. Shiv Raj Singh Patil".
2. "**Dr. Vijender Kumar Jain Gold Medal**" for securing Highest Marks in M.Sc. Mathematics (2002) in Maharaj Singh College, Saharanpur.
3. "**Dr.Suryakant Gold Medal**" for securing Highest Marks in M.Sc./M.A. (2002) Maharaj Singh College, Saharanpur in all the streams.

Annexure-8**SPECIAL ACHIVEMENTS**

▶▶ Degree of **Master of Arts in Sociology** is awarded in 2004 from Ch. Charan Singh University, Meerut. The main purpose of studying Sociology is to become more social and to understand the typical relationships of human beings.

▶▶ Degree of **Master of Arts in Political Science** is awarded in 2006 from Ch. Charan Singh University, Meerut. The basic reason of studying Political Science is to understand the skills of Politics and Diplomacy and then use the GOOD POINTS of them for the progress and development of MY Institute / Society / Organization.

▶▶ I had contributed a lot of numerical material in Book "**FITTER SHOP THEORY**" with the main Author Mr. S. D. Khanna (My Father) in Arihent Publication, Meerut, U.P. This book is widely used in Fitter Trade in Govt. Industrial Training Institute, UP.

▶▶ I had done a Six month certificate course of C & C++ Language and the basics of M.S. Word etc.

Annexure-9**EXTRA CURRICULAR ACTIVITIES**

- ✓ M.M. University Examination Paper Setter.
- ✓ Shobhit University Examination Paper Setter.
- ✓ Worked as LIAISON OFFICER in SIET, SAHARANPUR.
- ✓ Editor of the College Prospectus of SIET/AVIPS, Saharanpur.

Annexure-10**TEACHING METHODOLOGY**

As a teacher, one should always try to provide the knowledge and social experiences to our youth so that they become able to improve their future and the future of the entire planet.

Most of the students said that Mathematics is one the boring subject. On the other hand, it is the most scoring. Therefore, I always try to create light atmosphere in my classroom so that students can feel easy to understand the topic and feel free to ask the doubts.

Sometimes, response of the students is unexpectedly very good but some times comes in opposite way. So, I always try to give a small gap after 2 or 3 questions and discuss the current affairs with them and again connect the discussing topic with the next question. I always used to make my class interactive and innovative.

Annexure-11**Research Plan for Next Five Years**

Main motive of my research work is to provide more and authentic mathematical models about the vibration characteristics of visco-elastic plates of variable thickness. Mechanical/Design Engineers or Technocrats are advised to analyze and use the models with practical approach before finalizing a machine designs.

My Ph.D. work is carried out about the study of vibration of visco-elastic rectangular plate of variable thickness. In this work, we assumed that there is no temperature effect over all.

After completed Ph.D. work, now my main emphasis is on **Two dimensional Temperature effect on vibration of visco-elastic plates with varying thickness**. A lot of literature is available in one dimensional temperature variation but none work is available in the field of two dimensional temperature effect.

Annexure-12**ADMINISTRATIVE EXPERIENCE**

Period	Organization	Designation	Nature of Responsibility
28, June 2011 to 12, Sept, 2011	Maharishi Markandeshwar University, Mullana	In-charge of Academic Affairs in Diploma-B.Tech. Integrated Programme	Chairman of Discipline Committee, Anti-Ragging Squad, Time Table In-charge, Conduction of Examination etc.
Session:2010-2011	S.I.E.T., Saharanpur A.V.I.P.S., Saharanpur	Admission Coordinator	Chairman of Admission Committee, Counseling with Parents/Guardians & Students etc
01, Aug. 2006 to 03 Feb, 2011	S.I.E.T., Saharanpur A.V.I.P.S., Saharanpur	In-Charge of Print & Electronic Media	Publishing News of College activities such as Result Analysis, Awards distributions, Games, Sports, Cultural Events, Seminars, Conferences etc in Reputed News Papers

Annexure-13

Prof.(Dr.)Raghuvir Singh
Director General
 Shobhit Inst. of Engg. & Tech.,
 Gangoh, Saharanpur, PIN-
 247001 Phone : 0132-2765417

Prof.(Dr.)Deepak Gupta
H.O.D. Mathematics
 M.M.E.C., M.M.University
 Mullana, Ambala, Haryana
 Phone: 09896068604

Dr. Arun Kumar Gupta
Reader
 M. S. College
 Saharanpur, PIN-247001
 Phone:0132-2661555,9897318658

Annexure-14

FATHER'S NAME	SRI. SUKH DEV KHANNA (Retd. from Govt. I.T.I.)
MOTHER'S NAME	SMT. URMIL KHANNA (House Wife)
D.O.B.	22- AUG-1980
CATEGORY	GENERAL
NATIONALITY	INDIAN
MARITAL STATUS	NEVER MARRIED
BLOOD GROUP	O-POSITIVE
LANGUAGE KNOWN	HINDI, ENGLISH AND PUNJABI
RESIDENTIAL/ PERMANANT ADDRESS	3/1413,SANTOSHI MATA MANDIR WALI GALI JANAK PURI, DEHRADUN CHOWK SAHARANPUR, PIN:247001, (UP)