



Curriculum Vitae

1. Name

Dr. S M HAFIZUR RAHMAN

Professor, Institute of Education and Research (IER),
University of Dhaka, Dhaka-1000,
Email: hafiz.rahman@du.ac.bd Mobile: 01552353426

2. Date of Birth

January 01, 1974

Bangladeshi

3. Membership in Professional Societies

- **Executive Secretary**, Bangladesh Forum for Educational Development [BAFED], Since 2018 till date
- Member: National Association for Research in Science Teaching (NARST), A worldwide Organization for science teachers and educators, USA, Since 2012
- Assistant Secretary, Bangladesh Forum for Educational Development [BAFED], 2016-2017
- Member, Research Board, Foundation of Research for Planning and Development [FREPD], Since 2016

4. Education

School/College/ University	Years attended		Name of the Examination	Division/Class & Place	Year
	From	To			
Faculty of Education, Monash University, Australia	April 2007	January 2011	Doctor of Philosophy (PhD)	Awarded	2011
School of Education, Edith Cowan University, Australia	February 2006	January 2007	Master of Education	Distinction	2007
Department of Physics, University of Dhaka	1994- 95	1994- 95	Master of Science (Thesis) Subject: Physics	First Class Position: 2nd	1995
Department of Physics, University of Dhaka	1991- 92	1993- 94	Bachelor of Science (Hons) Subject: Physics	First Class Position: 2nd	1994
Zia Sarkarkhana College, Ashuganj, Comilla Board	1989- 90	1990- 91	Higher Secondary Certificate (HSC)	First Division*	1991
Ashuganj P.D kendra High School, Comilla Board	1987	1988	Secondary School Certificate (SSC)	First division	1989

5. Other Training

Period	Employing Organisation and your title/position. Contact information for references	Country	Summary of activities performed relevant to the assignment
February 03, 2013 – February 23, 2003	Organisation: Japan International Cooperation Agency (JICA)	Japan: Hiroshima University, Hiroshima and PADECO Co Ltd, Tokyo	Country focused training and dialogue program on implementation and evaluation of the primary curriculum in Science and Mathematics in Bangladesh

6. Language and Degree of Proficiency

Language	Speaking	Reading	Writing
Bangla	Fluent	Fluent	Fluent
English	Very Good	Very Good	Very Good

7. Countries of Work Experience: Bangladesh & Australia

8. Employment Record

A. Basic Employment (Full Time)

Institution	Position	Period
Institute of Education and Research (IER), University of Dhaka	Professor	April 01, 2013 to till date
Institute of Education and Research (IER), University of Dhaka	Associate Professor	July 25, 2009 - March 31, 2013
Institute of Education and Research (IER), University of Dhaka	Assistant Professor	December 22, 2002 - July 24, 2009
Institute of Education and Research (IER), University of Dhaka	Lecturer	May 17, 1999 - December 21, 2002

Responsibility: Teaching and Research

Bachelor of Education (Hons)

1. Physics 1, (Theory and Practical), First Semester, First Year
2. Physics 2 (Practical), Second Semester, First Year
3. Physics 4 (Theory), Fourth Semester, Second Year
4. Instructional Technology, Fifth Semester, Third Year
5. Teaching Physical Science, Fifth Semester, Third Year
6. Microteaching and Simulation, Sixth Semester, Third Year
7. Practicum: Internship, Seventh Semester, Third Year
8. Introduction to Educational Research, Eight Semester, Third Year

Master of Education

9. Methods and Techniques of Educational Research, First Semester
10. Trends and Issues in Science, Mathematics and Technology Education, First Semester
11. Innovation and Improvement in SMTE Education, Second Semester

12. Human Resource Development in SMTE education, First Semester
13. Research on Advancement in SMTE Education, Second Semester
14. Thesis Supervision
15. Internship Supervision

Master of Education (Evening)

16. Research in Education
17. Introduction to Educational Assessment
18. Trends and Issues in Science, Mathematics and Technology Education (SMTE)
19. Innovation and Improvement in SMTE Education, Second Semester
20. Human Resource Development in SMTE education, First Semester
21. Curriculum development in SMTE education
22. Teaching Sciences
23. Microteaching and Simulation
24. Thesis Supervision

MPhil

25. Science Education
26. Research in Education
27. Thesis supervision

PhD

28. Thesis Supervision

**** All Assigned work by Director and Academic Committee, C&D of the Institute.**

B. Project and Research Work Based Employment

Employing Organization, Position held, Contact Information for references	Period	Summary of activities performed relevant to the assignment
Employer 1: Social Science Research Council, Planning Division, Bangladesh Position held: Team Member Reference: Md. Habibur Rahman, Assistant Director, SSRC, Ministry of Planning Mobile: 01552-354984 Email: ssrc.planningdivision@yahoo.com	October 2019 – September 2021	Study Title: Secondary Science Teachers' Understandings and Challenges about to Develop and Assess the Creative Questions (Fellowship) Activities Performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Collection of Data, Design Analysis template, Data analysis, Report writing (Ongoing)
Employer 2: Bangladesh Technical Education Board (BTEB), Dhaka Position held: Team Member and Coordinator Reference: Dr. Md. Raju Mohammad Shahidul Islam Deputy Director (Research), BTEB Email: rmsislam@gmail.com Mobile: 01556622655	June 2019 - March 2020	Study Title: A Tracer Study for Matching Diploma in Engineering Curriculum for local and Global Employability Activities Performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination (Ongoing)

Employing Organization, Position held, Contact Information for references	Period	Summary of activities performed relevant to the assignment
Employer 3: Friendship, Bangladesh Position held: Team Member Reference: Brig Gen Ilyas Iftekhar Rasul Email: ilyasrasul@friendship.ngo Mobile: 01714497113	October 2019- August 2020	Study Title: Independent Evaluation of Friendship's Education Program Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination (International and National)
Employer 4: NAEM, Bangladesh Position held: Team Leader Reference: Ms Rokshana Bilkis, Director (Research) Email: rddivision.naem@gmail.com Mobile: 01552573798	July 2019 – June 2020	Study Title: Exploring the status and reasons of current science practical practices at the secondary level Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 5: NAEM, Bangladesh Position held: Team Leader Reference: Ms Rokshana Bilkis, Director (Research) Email: rddivision.naem@gmail.com Mobile: 01552573798	July 2018- June 2019	Study Title: Exploring the nature of science teaching in large class at secondary schools in Bangladesh, NAEM study 2018-19 Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 6: National Curriculum and Textbook Board (NCTB), Bangladesh Position held: Technical Member Reference: Dr. Md Riazul Hasan Member (Primary), NCTB Mobile: 01938477289	July 2017- June 2019	Study Title: Effectiveness of existing primary curriculum Activities performed: Design the study, Developed Tools, support to Design Analysis Template and Data analysis and Report
Employer 7: National Curriculum and Textbook Board (NCTB), Bangladesh Position held: Technical Member Reference: Dr. Md Riazul Hasan Member (Primary), NCTB Mobile: 01938477289	January 2018- June 2019	Study Title: Need assessment and situational Analysis of primary curriculum Activities performed: Design the study, Developed Tools, Support to Design Analysis template, Data analysis, Report writing,

Employing Organization, Position held, Contact Information for references	Period	Summary of activities performed relevant to the assignment
Employer 8: USAid (Through DMA) Position held: Team Member Reference: Md. Maqbal Bhuiyan Email:maqbul@dmabd.com Mobile: 01711533451	March, 2018 – June, 2018	Study Title: Government Primary School (GPS) Endline Evaluation: Reading Enhancement for Advancing Development Project Activities performed: Design the study, Developed Tools, Data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 9: BTEB, Dhaka Position held: Team Member & Coordinator Reference: Dr. Md. Raju Mohammad Shahidul Islam Deputy Director (Research), BTEB Email: rmsislam@gmail.com Mobile: 01556622655	July 2017-June 2018	Study Title: A Study for Enhancing enrolment and acceptability of SSC (Vocational), Dakhil (Vocational) and HSC (Vocational) courses Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 10: Police Head Quarters, Dhaka Position held: Team Member Reference: Mr. Md. Abdur Razzak AIG(R&P-2), Police Headquarters, Dhaka, Bangladesh, Email: aigp_r@police.gov.bd Mobile: Cell-01713373015	July 2017-June 2018	Study Title: Assessing the Training Curricula in terms of achieving organizational goal: Bangladesh police perspectives Activities performed: Design the study, Developed Tools, develop data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 11: NAEM, Bangladesh Position held: Team Leader Reference: Ms Rokshana Bilkis, Director (Research) Email: rddivision.naem@gmail.com Mobile: 01552573798	July 2017-June 2018	Study Title: Nature of secondary science teaching by non-science background teachers and its effect in promoting students' scientific literacy Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 12: NCTB Position held: Technical Member Reference: Prof. Md. Moshizzaman Member (Curriculum) Mobile: 01711254115	March 2018 - June 2018	Study Title: Try-out of Grade XI-XII Textbook (Bangla and English) Activities performed: Design Analysis template, Data analysis, Report writing, Dissemination

Employing Organization, Position held, Contact Information for references	Period	Summary of activities performed relevant to the assignment
Employer 13: JICA, Bangladesh Position held: Team Member Reference: Prof Aziz Ahmed Chowdhury Mobile: 01817054920	May 2017 – June 2017	Study Title: Impact Survey of JICA support program 2 under PEDP 3 Activities performed: Design and implement the Intervention (Lesson study), Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 14: BANBAIS (By FREPD) Position held: Team Member, Education Expert Reference: Mr. Nazrul Islam Khan Director, FREPD, Dhaka Email: frepd.bd@gmail.com Mobile: 01911358117	April 2017 – July 2017	Study Title: Study on Joyful Teaching Learning at Secondary Schools in Bangladesh Activities Performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 15: IMED (Through FREPD) Position held: Team Member, Education Expert Reference: Mr. Nazrul Islam Khan Director, FREPD, Dhaka Email: frepd.bd@gmail.com Mobile: 01911358117	February 2017- June 2017	Study Title: In-depth Monitoring on the project titled “Secondary Education Quality and Access Enhancement Project (SEQAEP)” Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 16: BANBAIS Position held: Consultant Reference: Prof Md. Shamsul Alam Mobile: 01715428432	July 2016- June 2017	Study Title: Assessing the quality of education through classroom observation 2015 Activities performed: Design Analysis template, Data analysis, Report writing, Dissemination
Employer 17: JICA, Bangladesh Position held: Project Researcher Reference: Prof Aziz Ahmed Chowdhury Mobile: 01817054920	May 2016 – July 2016	Study Title: Monitoring JICA support program 2 under PEDP 3 Activities performed: Design and implement the Intervention (Lesson study), Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 18: JICA, Bangladesh Position held: Project Researcher Reference: Prof Aziz Ahmed Chowdhury Mobile: 01817054920	August 2014- December 2015	Study Title: Impact Survey-Endline Survey for JICA Support Program 2 Activities Performed: Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination

Employing Organization, Position held, Contact Information for references	Period	Summary of activities performed relevant to the assignment
Employer 19: UGC, Bangladesh Position held: Team Leader Reference: Md. Nizam Uddin Desk Officer, DU Mobile: 01712591228	July 2014- June 2015	Study Title: The Importance of Pedagogical Content Knowledge as a Focus of Secondary Science Teachers’ Professional Learning Community’ Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 20: NAEM, Bangladesh Position held: Team Leader Reference: Ms Rokshana Bilkis, Director (Research) Email: rddivision.naem@gmail.com Mobile: 01552573798	July 2014 – June 2015	Study Title: Influence of “Lesson Study” in promoting students’ Scientific Literacy: A Perspectives from Secondary Science Teachers’ Professional Learning Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 21 : JICA, Bangladesh Position held: Project Researcher Reference: Prof Aziz Ahmed Chowdhury Mobile: 01817054920	January 2014 - May 2014	Study Title: Review and Situation Analysis Survey of JICA Support Program 2 Activities performed: Design and implement the Intervention (Lesson study), Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 22: BANBAIS Position held: Consultant Reference: Prof Md. Shamsul Alam Mobile: 01715428432	July 2014- June 2015	Study Title: Assessing the quality of education through classroom observation 2013 Activities performed: Design Analysis template, Data analysis, Report writing, Dissemination
Employer 23: FREPD Position held: Team Member Reference: Mr. Nazrul Islam Khan Director, FREPD, Dhaka Email: frepd.bd@gmail.com Mobile: 01911358117	April 2014 – May 2014	Study Title: Problem of secondary science Education in Bangladesh Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination

Employing Organization, Position held, Contact Information for references	Period	Summary of activities performed relevant to the assignment
Employer 24: NAEM Position held: Team Leader Reference: Ms Rokshana Bilkis, Director (Research) Email: rddivision.naem@gmail.com Mobile: 01552573798	July 2013 – June 2014	Study Title: Status of school science laboratories and scope to implement investigation at secondary schools in Bangladesh Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 25: World Bank and DPE Position held: Consultant Member Professor Dr. Md Abdul Maleque Director, IER, DU Email: director.ier@du.ac.bd Mobile: 01716787160	April 2013 – December 2018	Study Title: ROSC-IER Training cell Activities performed: Develop Training Manual, Conduct TOT, Design Training, Monitoring and Supervision of Training, Report, Design and Implement Case study
Employer 26: FREPD, Bangladesh Position held: Team Member Reference: Mr. Nazrul Islam Khan Director, FREPD, Dhaka Email: frepd.bd@gmail.com Mobile: 01911358117	July 2012 – June 2013	Study Title: Status of Science Education at the secondary Level in Bangladesh Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 27: UNDP-CHTDF Position held: Team Member – National Education Consultant Reference: Mr. Mohiuddin Ahmed Mobile: 01774488793	October 2012 - November 2012	Study Title: Midterm review of Strengthening Basic Education in the Chittagong Hill Tracts, Phase-II Activities performed: Design the study, Developed Tools, data collection and Analysis, Report writing, Dissemination
Employer 28: JICA, Bangladesh Position held: Project Researcher Reference: Prof Aziz Ahmed Chowdhury Mobile: 01817054920	February 2012 - June 2012	Study Title: Review and Situation Analysis Survey of JICA Support Program 2 Activities performed: Design Intervention and Implement, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 29: IMED (Though Yosuf Associates) Position held: Team Member Mr. Md Yusuf Ali Mobile: 01713010058	April 2012- June 2012	Study title: Evaluation the Impact of TQI-SEP Project Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination

Employing Organization, Position held, Contact Information for references	Period	Summary of activities performed relevant to the assignment
Employer 30: UGC, Bangladesh Position held: Team Leader Reference: Md. Nizam Uddin Desk Officer, DU Mobile: 01712591228	July 2011- June 2012	Study Title: Professional Learning of Secondary Science Teachers through development of Professional learning communities in Bangladesh: A case study. Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 31: NAEM, Bangladesh Position held: Team Leader Reference: Ms Rokshana Bilkis, Director (Research) Email: rddivision.naem@gmail.com Mobile: 01552573798	July 2011- June 2012	Study Title: Learning science at the junior secondary level and its impact on the Enrolment trends in secondary science stream in Bangladesh Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 32: UNESCO, Dhaka Position held: Team Member Reference: Ms. Shirin Akter. UNESCO, Dhaka Office Mobile: 01732394686	June 2011 - September 2011	Study Title: Equivalency Education field testing Program Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 33: NAPE, Bangladesh Position held: Research Consultant Reference: Mr. Rangalal Roy Senior Specialist NAPE Email: rangalal1965@gmail.com Mobile: 01712619339	August 2008 - October 2008	Study Title: A study on the impact of subject-based training at URC Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination
Employer 34: JICA, Bangladesh Position held: Education Research Officer Professor Dr. Md Abdul Maleque Director, IER, DU Email: director.ier@du.ac.bd Mobile: 01716787160	November 2001 - April 2002	Study Title: A comparative study of Ideal and Non Ideal primary school. Activities performed: Design and Conduct Case study, Analysis and Report writing

Employing Organization, Position held, Contact Information for references	Period	Summary of activities performed relevant to the assignment
Employer 35: UNESCO, Dhaka Position held: Team Member Reference: Ms. Shirin Akter. UNESCO, Dhaka Office Mobile: 01732394686	October 2000 - January 2001	Study Title: Improving Present learning Assessment practices to Ensure Quality of Primary Education Activities performed: Design the study, Developed Tools, develop data collection framework and supervision data collection, Design Analysis template, Data analysis, Report writing, Dissemination

Experiences: Curriculum Development

Position	Description	Period
Member, Primary Science Curriculum development team	Primary science Curriculum 2020	December 2019 to March 2020
Member	Development of Aims, objectives and terminal competencies	June-July, 2019
Member	Development of Physics Curriculum for B Ed (Hons) Program, Bangladesh Open University, Gazipur	July – December 2017
Member	Development of Physics Curriculum for B Ed (Hons) Program, University of Rajshahi, Rajshahi.	January –June 2016
Member Secretary	Curriculum Renovation and Evaluation Committee for Bachelor of Education (Hons) and Master of Education Programme. IER, University of Dhaka	Since January 2013
Member, Curriculum Development Team	Revision of Science Curriculum for DPED Programme (Both Subject and Pedagogical Knowledge)	December 2015 – February 2016
Member	Development of Manual for National Framework for Primary Science Assessment	March 2015 – February 2016
Team Leader, Curriculum Development Team	Development of Teaching Physics Curriculum for BEd Programme for National University Under TQI Phase II, Ministry of Education	July 2014 – July 2015
Team Leader, Curriculum Development Team	Development of Curriculum for CPD Physics for Grade XI-XII Teachers Under TQI Phase II, Ministry of Education	January 2015- June 2015
Team Leader, Curriculum Development Team	Development of Curriculum for CPD Physics for Grade IX-X teachers Under TQI Phase II, Ministry of Education	July 2014- December 2014

Position	Description	Period
Member, Curriculum Development Team	Development of Curriculum for Manual of Science Practical Work under SESEIP Programme	January 2015-February 2015
Member, Curriculum Development Team	Science Curriculum for DPED Programme (Both Subject and Pedagogical Knowledge)	May - June 2011
Member, Curriculum Rational Evaluation Team	National Curriculum of Primary Science for Grade III, IV & V; NCTB	October 2011
Member, Rational Evaluation Team	Teacher's Guide for III, IV & V Primary Science; NCTB	November 2012

Experiences: Books and Materials

Position	Description	Period
Assessment Specialist	Development of national assessment framework for tools and methods of Primary Education for all Subjects, NCTB	July 2016-June 2018
Writer	Educational Research, MED Program, Bangladesh Open University	July 2018 - December 2018
Assessment Specialist	Development of Continuous Assessment framework and tool (Arts & crafts) for the secondary Education, BEDU, Dhaka Examination Board	June 2019
Assessment Specialist	Development of Assessment guideless for Grade I-III (Without Exam)	July 2019
Assessment Specialist	Development of Manual for National Framework for Primary Science Assessment	July 2016-June 2019
Assessment Specialist	Development of Continuous Assessment Tools for secondary Education, BEDU, Dhaka Examination Board	May 2018
Writer and Editor	Physics Teaching for BEd Program, TQI, Ministry of Education	June-December 2017
Writer	Research Methodology, Published by Bangladesh Open University	June-December 2017
Writer	Resource Book: Primary Science: Subject Knowledge (SK) and Pedagogical Knowledge (PK): Revised Version	July – December 2016
Writer	Revision of Foundation Training Manual for ROSC Teacher, ROSC Project, MOPME	March 2016 - April 2016
Writer	Manual for Science Practical Work under SESEIP Programme, Ministry of Education	March 2015-June 2015
Writer	Manual for National Framework for Primary Science Assessment, NCTB	March 2015 – February 2016

Position	Description	Period
Writer & Coordinator, Writer Panel	Secondary Physics Teachers' CPD Manual under TQI-II project for secondary teachers, Ministry of Education	June 2014 – July 2015
Writer	Manual for CMC member's Training for ROSC Project	July 2014 – December 2014
Writer & Coordinator, Writer Panel	Secondary Physics Teachers' CPD TOT Manual under TQI-II project for secondary teachers, Ministry of Education	June 2014 – July 2015
Writer & Coordinator, Writer Panel	Higher Secondary Physics Teachers' CPD Manual under TQI-II project for secondary teachers, Ministry of Education	June 2014 – July 2015
Writer & Coordinator, Writer Panel	Higher Secondary Physics Teachers' CPD TOT Manual under TQI-II project for secondary teachers, Ministry of Education	June 2014 – July 2015
Writer	Resource Book: Primary Science: Subject Knowledge (SK) and Pedagogical Knowledge (PK)	July – August 2011
Writer	Instruction Guide: Primary Science: Subject Knowledge and Pedagogy	September - October 2011
Writer	National Science Textbook for Grade VI. NCTB	March – April, 2013
Writer	National Science Textbook for Grade VII. NCTB	May – June, 2013
Writer	National Science Textbook for Grade VIII. NCTB	July – August, 2013
Writer	National Science Textbook for Grade IX-V. NCTB	August -September 2013

List of Publications in Refereed Journal

International

1. Secondary Science Teachers' Views on Resource Folio to Improve Their Pedagogical Content Knowledge. Journal of Science and Mathematics Education in Southeast Asia, Volume 43, December 2020.
2. Secondary science teachers' pedagogical content knowledge from content representation (CoRe) on genetics, Asia-Pacific Forum on Science Learning and Teaching, Volume 18, Issue 2, Article 3, December, 2017, ISSN 1609-4913.
3. Changing teaching perceptions and culture of professional practice: A Case of secondary science teachers in Bangladesh. In Jeninka Greenwood (Ed.). *Research and Educational Change in Bangladesh. A collaborative book project between* University of Canterbury and University of Dhaka. Dhaka University Press Ltd.
4. Influence of Professional Learning Community (PLC) on Learning a constructivist teaching approach (POE): The case of secondary science teachers of Bangladesh, Asia-Pacific Forum

on Science Learning and Teaching, Volume 13, Issue 1, Article 3 (Jun., 2011), ISSN 1609-4913.

5. Influence of Professional Learning Community (PLC) on secondary science teachers' culture of professional practice: The case of Bangladesh, *Asia-Pacific Forum on Science Learning and Teaching*, Volume 12, Issue 1, Article 4 (Jun., 2011), ISSN 1609-4913.
6. The influence of professional learning on secondary science teachers' ways of Improving their subject teaching in Bangladesh. In W. K. Chan (Ed.), *Asia Pacific education: Diversity, challenges and changes*. Melbourne: Monash University Publishing.
7. Students' perceptions of learning science in small groups: A case study in higher education. *Brunei International Journal of Science and Mathematics Education*. 2010, Vol 2 (1), 32-47. ISSN 2076-0868.

National

8. Challenges of using analogy in secondary Physics teaching-learning: Bangladesh perspective. Accepted for Publication in *Teacher's World: Journal of Education and Research*. V.46. 2019.
9. Exploring factors affecting STEM enactment: Stakeholders' Perspectives. *Teacher's World: Journal of Education and Research*. V.44. 2017 (Published in December 2020).
10. Teacher's Belief, Practice and Challenges in implementing Inquiry Based Teaching at Higher Secondary Biology Class. *NAEM Journal, A journal of National Academy for Educational Management, Ministry of Education*. Volume 13, Issue 26, July –December 2018, ISSN 1997-4248.
11. Challenges of implementing the Inquiry Based Teaching learning in Primary science classroom, *Journal of Teacher Education, Bangladesh Open University*, V6, N1, 2019, ISSN 1812-7517
12. Teachers' views regarding the new approaches of primary science textbooks: Rural and Urban Perspectives, *NAPE Journal*. 10 (1), June 2019. ISSN 2519-5174
13. COVID-19 related news in media: Analyzing the response of mass people using scientific literacy framework in Bangladesh. *Bangladesh Education Journal*, V 18, N1, June 2019 (Published in June 2020)
14. Current status and challenges of learning from small group work in secondary science education in Bangladesh, *NAEM Journal, A journal of National Academy for Educational Management, Ministry of Education*. V 12, Issues 23 January-June 2017
১৫. বাংলাদেশের মাধ্যমিক স্তরের শিক্ষার্থীদের গণিত বিষয়ে ভীতির কারণ অনুসন্ধান, বাংলাদেশ শিক্ষা সাময়িকী, চতুর্দশ বর্ষ, দ্বিতীয় সংখ্যা, ডিসেম্বর ২০১৭
16. Assessment practices in science practical work at IER: Nature, impact and improvement, *Teacher's World: Journal of Education and Research*. V.43. 2016.
17. Secondary Science Teachers' Understandings and Challenges in Working with Creative Question in Physics, *Teacher's World: Journal of Education and Research*. V.43. 2016.

18. Reflection of Pedagogical Content knowledge (PCK) on DPED Science Curriculum, Primary Education Journal, Volume-9, Number-1 June 2016,
19. Influence of „Lesson Study“ in promoting students“ scientific literacy: A perspective from secondary science teachers“ professional learning, Teacher's World: Journal of Education and Research. V.42. 2015.
20. Using analogy in secondary science teaching practice to promote scientific literacy, Teacher's World: Journal of Education and Research. V.42. 2015
21. Developing instructional plan for „Refraction of Light“ of class Eight science using 5E instructional model, Teacher's World: Journal of Education and Research. V.40. 2014.
22. Science teachers“ perception towards use of ICT in Teaching at secondary level, Teacher's World: Journal of Education and Research. V.40. 2014.
23. University Science Teacher“s Views about „Nature of Science“ (NOS) and its influence on their practices, Teacher's World: Journal of Education and Research. V.39.2013 ISSN 0040-0521.
24. Influence of Secondary Science Teachers“ Professional Learning Communities in Promoting Students“ Scientific Literacy, Teacher's World: Journal of Education and Research. V.39. 2013 ISSN 0040-0521.
25. Status of Scientific Literacy achieved by grade VIII students in rural schools in Bogra districts of Bangladesh. *NAEM Journal, A journal of National Academy for Educational Management, Ministry of Education.* 8(15), ISSN-1997-4248. July-December 2012.
26. Secondary Science Teachers' understandings about their Professional Learning activities: The Case of Bangladesh. *Teacher's World: Journal of Education and Research.* V.37-38. 167-174 ISSN 0040-052.
27. Secondary Science Teachers“ view about subject matter knowledge and its impact on their teaching learning process. *Teacher's World: Journal of Education and Research.* V.37-38. 57-67 ISSN 0040-0521 .
28. Impact of Teaching Load in Teaching Learning Process: Secondary Science Teachers“ views. *NAPE Journal.* 6 (1), 12-26. June 2012.
29. Secondary Science Teachers“ views about Pedagogy and its impact on their teaching learning process. *Green University Review*, 2011, Vol. 2 (1), 143-153, ISSN 2218-5283.
30. Secondary science teachers“ views about science as a subject to teach and its impact on teaching-learning process. *NAEM Journal, A journal of National Academy for Educational Management, Ministry of Education.* 7(14), Accepted. ISSN-1997-4248.
31. The Concerns Based Adoption Model (CBAM): A possibility for facilitating the process of teachers“ professional development in Bangladesh. *NAEM Journal, A journal of National Academy for Educational Management, Ministry of Education.* 4(8). ISSN-1997-4248.
32. Prospective Science Teachers' and Educators' Views and Understanding of Ideas about Science. *NAEM Journal, A journal of National Academy for Educational Management, Ministry of Education.* 4(8), June 2009. ISSN-1997-4248

33. Reflections of Education for Sustainable Development (ESD) Concept in National Curriculum of Bangladesh: An Explorative Study at Lower Secondary Science Level. *Proshikhyan, A Journal of Training and development*. 16(2), 17-28. US library of Congress Catalog Number: B-95902106-S, ISSN Number: 1819-9097
34. Professional Learning Community: A possibilities for the secondary science teachers for improving their practices. *Proshikhyan, A Journal of Training and development*. 16(1), 17-28. US library of Congress Catalog Number: B-95902106-S, ISSN Number: 1819-9097
35. Development of Professional Learning Communities: Secondary Teachers in Bangladesh. *NAEM Journal, A journal of National Academy for Educational Management, Ministry of Education*. 3(6), 1-12. ISSN-1997-4248
36. Teachers' beliefs in effective secondary science teaching: An analysis of current student teachers' perception of IER, University of Dhaka. *Teacher's World: Journal of Education and Research*. V.32. 53-59. ISSN 0040-0521
37. Content Analysis of the New Bachelor of Education (B.Ed) Curriculum for the Secondary School Teachers in Bangladesh. *Proshikhyan, A Journal of Training and development*. 15 (2) , 23-34. US library of Congress Catalog Number: B-95902106-S, ISSN Number: 1819-9097
38. Introducing open investigation in secondary science practical work: Prospects and Challenges in the context of Bangladesh. *Teacher's World: Journal of Education and Research*. 30-31, 19-33. ISSN 0040-0521
39. Assessment Policy and Practice at the Institute of Education and Research: A Reflective study. *Teacher's World: Journal of Education and Research*. 30-31,, 77-92. ISSN 0040-0521
40. Revisiting the STEBI – B: Evaluating pre-service science teachers' beliefs in quality teacher education (QTE) in Lagos – State, Nigeria *Proshikhyan, A Journal of Training and development*. 15 (1), 57-64. US library of Congress Catalog Number: B-95902106-S, ISSN Number: 1819-9097
41. Secondary Education Curriculum Materials: Content Analysis of Physics Text Book and corresponding implication for the nature of learning. *Teacher's World: Journal of Education and Research*. 26-27, 103-118. ISSN 0040-0521
42. Standard Model and CP violations in Neutral B-Meson Decays. Teachers' World, IER, University of Dhaka. *Teacher's World: Journal of Education and Research*. 26-27, 131-138. ISSN 0040-0521
43. Continuous Pupil Assessment in Primary Education: An Analysis of Practising Teacher's Perceptions. *Bangladesh Education Journal*. 1(1), 77-86. ISSN 1811-0762.
44. Situation of Continuous Pupil Assessment in Primary Education. *Social Science Review*. Accepted. ISSN 1562-269X.

Book Editor

Introductory discussion of curriculum. Writer: Shukla Sikder. **Anjali Biswas and lakshman Chandra Sikder Publications**, Dhaka, Bangladesh

Presentation in International Conference

1. Stakeholders' Perspectives on Feasibilities of STEM Education, Paper presented at physical science conference 2020 to be held at Atomic Energy Commission, Dhaka, Bangladesh, 5-7 March, 2020
2. Exploring the strategies of science teaching in large class at secondary schools in Bangladesh, Paper presented at seventh (8th) biennial international conference on science and mathematics to be held in SEAMEO RECSAM, Penang, Malaysia, 14-18 November, 2019
3. Assessment in higher education: A challenge for achieving sustainable development goals. Paper presented at IER national conference 2018 on 'Achieving Sustainable Development Goals in Bangladesh: Educational Responses, Challenges and Possibilities' to be held at IER, University of Dhaka, 31 March-April 1, 2018
4. The importance of Pedagogical Content knowledge as a focus of secondary science teachers' Professional Learning Community, Paper presented at seventh (7th) biennial international conference on science and mathematics to be held in SEAMEO RECSAM, Penang, Malaysia, 13-17 November, 2017
5. Challenges in Implementing Investigation Based Practical Work in Secondary Science Classes in Bangladesh " has been reviewed and accepted for presentation at the 2016 Korean Association for science Education International Conference where the conference theme is "Future Science Education: International Perspectives". The conference will be held at at Kyungpook National University (<http://www.knu.ac.kr>), **Daegu Metropolitan City, Korea** from Jan. 28 to 30, 2016.
6. Role of Education in Development and Democracy in Bangladesh: STEM (Science, Technology, Engineering and Mathematics) Education for 21st Century Challenges" has been reviewed and accepted for presentation at the 2015 BDI International Conference - *Development and Democracy in Bangladesh: Problems and Prospects*. Organized in partnership with the Institute for South Asia Studies and the Subir & Malini Chowdhury Center for Bangladesh Studies (both housed at the University of California, Berkeley), the conference will be held on November 6-8, 2015 at the **University of California, Berkeley** campus.
7. Learning science at the junior secondary level and its impact on the enrolment trends in secondary science stream in Bangladesh, Presented at International Conference: Education in Pakistan: Practices and Challenges will be held at Bank road Campus, **University of Education Lahore, Pakistan** on 6th-7th January, 2014.
8. A shift towards Professional Learning from Professional Development: A Case of Bangladeshi Secondary Science Teachers. Presented at the 86th NARST Annual **International Conference held in Rio Grande, Puerto Rico** from April 6 - 9, 2013.

9. Engaging in professional learning communities: A way to address alternative conceptions in science of junior secondary science teachers in Bangladesh. Presented at The Annual Conference of Monash university Education research community (MERC, 2010), **Monash University, Melbourne**, 2-7 July, 2010.
10. Developing secondary science teachers' professional learning communities. presented at The 41st Annual Conference of the Australasian Science Education Research Association (ASERA 2010), Newcastle, New South Wales, **Australia**, 30-2 July, 2010.
11. Turning Learning into Action: Professional learning of junior secondary science teachers through developing professional learning communities in Bangladesh. Presented at Monash university Research community colloquium, June 8, 2010.
12. The professional learning Community: A way to engage junior secondary science teachers to change their teaching perceptions and the culture of professional practice in Bangladesh. Presented at SYMPOSIUM ON INTERNATIONAL RESEARCH COLLABORATION, Melbourne, Victoria, Australia, February 25, 2010.
13. Presented a Paper titled "Professional Learning of Junior Secondary Science Teachers In Bangladesh" at MERC conference during Winter School 2007(July 04, 2007).
14. Current status of science teaching at junior secondary level in Bangladesh -Towards developing professional learning communities among science teachers. presented at The 40th Annual Conference of the Australasian Science Education Research Association (ASERA 2009), **Geelong, Victoria, Australia**, 1-4 July, 2009.

Academic Thesis Supervision

- PhD : 05 student on Science Education- Supervision (Ongoing)
- MPhil : 05 Students on Science Education (Ongoing)
- MEd : 10 Students on Science and Mathematics Education (Ongoing)
- MEd : 45 Students on Science and Mathematics Education (Completed)

Major Thesis Supervision:

- Using analogy and making it effective for secondary science students
- Promoting Scientific Literacy through Ensuring Constructivist Learning Environment in Science Classroom
- Professional learning of Secondary Science Teachers: A case of Monipoor School, Dhaka.
- The role of professional learning community to address Beginning Science Teachers' difficulties in their practice
- Investigation of the reasons of students' fear in Mathematics at the secondary level in Bangladesh
- The Influential factors of not choosing science at secondary level; Students' perspectives
- Exploring secondary Science Teachers' pedagogical Content knowledge (PCK) from the content representation (CoRe) on Genetics
- Barriers in Teaching learning process of mathematics at secondary level: A quest for quality improvement
- Effectiveness of present laboratory activities in developing grade X students scientific literacy in Dhaka city Education (Completed)

Consultation in Thesis:

- Analysis of Primary Science Curriculum, MEd Thesis, IER, DU
- Analysis of Junior Secondary Science Curriculum, MEd Thesis, IER, DU

PhD Evaluation

- One PhD Thesis from Monash University, Study
- Two PhD from Different University of ,Bangladesh
- One PhD from Alagappa University

Training Experience:

1. Worked as a Specialist and Resource person for **TQI-SEP** project Phase-2 at IER Organized by Ministry of Education.
2. Worked as a Facilitator in TOT sessions to select Master Trainer for **TQI-SEP** project (2007) at IER Organized by Ministry of Education.
3. Worked as a Facilitator both in TOT session and Field level sessions for BRAC science teacher training program (2003-2005)
4. Trained Teachers from all faculty of Bangladesh Open University on structure and assessment process of creative questions.
5. Working for Faculty Development of Stamford University, Prime University and Green University, Dhaka.
6. Working for Faculty Development of Different Secondary Schools in Dhaka.
7. Trained all Faculty of KUET for Curriculum, Teaching leaning and Assessment.

Professional Affiliations

- Associate Editor, TEACHER’S WORLD- A journal of Education and Research, 2013-2017
- Reviewer: Asia Pacific Forum for Science Learning and Teaching Journal
- External Assessor (Promotion of Academics), Universiti Sains Malaysia.
- External Assessor, (Promotion of Academics), University of CAPE coast , Ghana
- Technical Advisor: Bangladesh Science Outreach [BSO]- First Round and Dhaka Phase – An Organization for Promoting Science in Schools and supported by American Centre, Dhaka. 2013-2015

11. Work Undertaken that best illustrates my capability to handle this Assignment:

- COVID-19 related news in media: Analyzing the response of mass people using scientific literacy framework in Bangladesh
- Secondary Science Teachers’ Understandings and Challenges about to Develop and Assess the Creative Questions
- Exploring the status and reasons of current science practical practices at the secondary level
- Nature of secondary science teaching by non-science background teachers and its effect in promoting students’ scientific literacy
- Study on Joyful Teaching Learning at Secondary Schools in Bangladesh
- In-depth Monitoring on the project titled “Secondary Education Quality and Access Enhancement Project (SEQAEP)

- Assessing the quality of secondary education through classroom observation 2015
- The Importance of Pedagogical Content Knowledge as a Focus of Secondary Science Teachers' Professional Learning Community"
- Influence of "Lesson Study" in promoting students' Scientific Literacy: A Perspectives from Secondary Science Teachers' Professional Learning
- Assessing the quality of secondary education through classroom observation 2013
- Problem of secondary science Education in Bangladesh
- Status of school science laboratories and scope to implement investigation at secondary schools in Bangladesh
- Professional Learning of Secondary Science Teachers through development of Professional learning communities in Bangladesh: A case study.
- Evaluation the Impact of TQI-SEP Project
- Learning science at the junior secondary level and its impact on the Enrolment trends in secondary science stream in Bangladesh
- Development of Teaching Physics Curriculum for BEd Programme for National University Under TQI Phase II, Ministry of Education
- Development of Curriculum for CPD Physics for Grade IX-X teachers Under TQI Phase II, Ministry of Education
- Development of Continuous Assessment framework and tool (Arts & crafts) for the secondary Education, BEDU, Dhaka Examination Board
- Development of Continuous Assessment Tools for secondary Education, BEDU, Dhaka Examination Board
- Secondary Physics Teachers' CPD Manual under TQI-II project for secondary teachers, Ministry of Education
- Writing National Science Textbook for Grade VI-X. NCTB
- Secondary Science Teachers' Views on Resource Folio to Improve Their Pedagogical Content Knowledge.
- Secondary science teachers' pedagogical content knowledge from content representation (CoRe) on genetics,
- Changing teaching perceptions and culture of professional practice: A Case of secondary science teachers in Bangladesh.
- Influence of Professional Learning Community (PLC) on Learning a constructivist teaching approach (POE): The case of secondary science teachers of Bangladesh,
- Influence of Professional Learning Community (PLC) on secondary science teachers' culture of professional practice: The case of Bangladesh
- The influence of professional learning on secondary science teachers' ways of Improving their subject teaching in Bangladesh..
- Challenges of using analogy in secondary Physics teaching-learning: Bangladesh perspective.
- Exploring factors affecting STEM enactment: Stakeholders' Perspectives
- .Current status and challenges of learning from small group work in secondary science education in Bangladesh,
বাংলাদেশের মাধ্যমিক স্তরের শিক্ষার্থীদেরগণিত বিষয়ে ভীতির কারণ অনুসন্ধান
- Influence of „Lesson Study“ in promoting students' scientific literacy: A perspective from secondary science teachers' professional learning,
- Using analogy in secondary science teaching practice to promote scientific literacy,
- Developing instructional plan for „Refraction of Light“ of class Eight science using 5E instructional model,
- Science teachers' perception towards use of ICT in Teaching at secondary level,
- Influence of Secondary Science Teachers' Professional Learning Communities in Promoting Students' Scientific Literacy,

- Status of Scientific Literacy achieved by grade VIII students in rural schools in Bogra districts of Bangladesh.
- Secondary Science Teachers' understandings about their Professional Learning activities: The Case of Bangladesh.
- Secondary Science Teachers' view about subject matter knowledge and its impact on their teaching learning process.
- Impact of Teaching Load in Teaching Learning Process: Secondary Science Teachers' views.
- Secondary Science Teachers' views about Pedagogy and its impact on their teaching learning process.
- Secondary science teachers' views about science as a subject to teach and its impact on teaching-learning process..
- The Concerns Based Adoption Model (CBAM): A possibility for facilitating the process of teachers' professional development in Bangladesh.
- Reflections of Education for Sustainable Development (ESD) Concept in National Curriculum of Bangladesh: An Explorative Study at Lower Secondary Science Level.
- Professional Learning Community: A possibilities for the secondary science teachers for improving their practices.
- Development of Professional Learning Communities: Secondary Teachers in Bangladesh.
- Teachers' beliefs in effective secondary science teaching: An analysis of current student teachers' perception of IER, University of Dhaka.
- Content Analysis of the New Bachelor of Education (B.Ed) Curriculum for the Secondary School Teachers in Bangladesh.
- Introducing open investigation in secondary science practical work: Prospects and Challenges in the context of Bangladesh.
- Secondary Education Curriculum Materials: Content Analysis of Physics Text Book and corresponding implication for the nature of learning.

CERTIFICATION [Do not amend this certification].

I, the undersigned, certify that (i) I was not a former employee of the Client immediately before the submission of this proposal, and (ii) to the best of my knowledge and belief, this bio-data correctly describes myself, my qualifications, and my experience. I understand that any wilful misstatement described herein may lead to my disqualification or dismissal, if engaged.

I have been employed by the Institute of Education and Research, University of Dhaka continuously for the last twelve (12) months as regular full time staff. Indicate "Yes" or "No" in the boxes below:

Yes

☐

NO

☐

Signature



Date of Signing

26 /02/ 2021
Day/ Month/ Year