Success of any education reform depends to a large extent on professional development of teachers who play a major role in implementing the intended reform. Professional development efforts, therefore, have to aim at improving the content knowledge, pedagogical skills, understanding of education reform and what it means for learners as these are essential components for improving the teaching and learning in schools. The NCERT addresses itself to the task of designing and validating both pre-service and in-service teacher education programmes. The programmes and activities of the Department of Teacher Education & Extension (DTEE) focus on research, development of learning resources materials, capacity building of teachers and teacher educators, academic support to the centrally-sponsored institutions of teacher education like DIETs, CTEs, IASEs and SCERTs; promotion of innovative practices in teacher education and school education and organisation of extension programmes.

The main functions of the department are to:

- undertake research on various issues/problems in teacher education to provide data base and empirical evidence for policy analysis and planning in teacher education;
- conduct policy research evaluative studies and comparative studies on issues and problems related to pre-service teacher education curriculum, in-service training designs and pedagogical knowledge and skills, practice teaching and its supervision;
- perform advisory role in teacher education and provide technical support to MHRD and State/UT governments in formulation, implementation and
evaluation of Centrally Sponsored Schemes for qualitative improvement of teacher education;
- design and validate pre-service and in-service education and training programmes for teachers at different levels;
- organise in-service and continuing education programmes of varied duration for professional development of teachers and teacher educators at different levels utilising emerging learning technologies including EDUSAT;
- develop prototype instructional materials based on new perspectives on learner and learning process, pedagogy, learning technologies and training as highlighted in NCF-2005;
- adopt and assist SCERTs/SIEs for developing their capabilities as professional institutions to improve the quality of school education and teacher education in their State/UTs; and
- promote innovations and experimentations in the field of school education and teacher education.

**Major Activities of the Department during 2008-09**

**Research**

**A Comparative Study of Pre-service Teacher Education Programmes at Secondary Stage in India, Sri Lanka, Pakistan and Bangladesh**

The main objective of the study was to compare different components of pre-service teacher education programme at secondary stage in India, Sri Lanka, Bangladesh and Pakistan and also draw the implications for improving its quality. The major findings of the study were: (i) the duration of pre-service teacher education programme was one year after graduation in India, Bangladesh and Pakistan, while it was three years after twelve years of schooling in Sri Lanka; (ii) B.Ed. institutions were managed by government and private managements; (iii) all the countries were having regulatory body like NCTE in India; (iv) the compulsory theory papers prescribed in B.Ed. course were almost common in all the countries; (v) the school based activities were found very useful for becoming an effective teacher; (vi) each student teacher was required to opt for two methodology courses; (vii) lecture method was largely used for transacting the curriculum; (viii) the Principals, Teacher-Educators and Student-Teachers opined that one year duration of B.Ed. programme was very less and it should be increased for two years.

**A Study of Professionalism of Rural Primary School Teachers**

The objective was to study the professionalism among rural primary school teachers. The sample of the study consists of 189 rural primary schools drawn from 22 states of the country. 617 rural primary school teachers and 189 head masters of these schools participated in the study. The data of the study included 1072 classroom observations and 1773 student interviews. Findings indicate that teachers in rural areas have to function under tremendous resource constraints both in terms of infrastructural facilities and human resources. Teachers consider themselves as professionals; however it is not reflected in their behaviour. The classroom teaching of rural teachers remains a routine exercise with very little efforts made by them to involve the students’ activity, and practice
any innovative method. Corporal punishment is frequently used by these teachers to discipline children. Very few teachers made any self initiated efforts for their own professional growth and development, apart from attending the regular in-service training programmes organised by the government.

Comprehensive Evaluation of Centrally Sponsored Scheme on Restructuring and Re-organisation of Teacher Education

The objective of the study was to evaluate the capacity and functioning of DIETs, CTEs, IASEs, and SCERTs in all the States and Union Territories and to recommend changes in teacher education scheme in the light of the present challenges in school education. The data were collected from DIETs, CTEs, IASEs and SCERTs through questionnaires and focus group discussion with stakeholders. Interim report was prepared and submitted to MHRD.

Development


The programme on Reformulation of Two-Year B.Ed., Four-Year B.Sc. and B.A.B.Ed. of RIEs was conducted in pursuance of the recommendations of Govinda Committee constituted by NCERT for the review of teacher education programmes in RIEs. The syllabi of the programmes have been prepared taking into consideration NCF-2005, Focus Group Report on Teacher Education, Govinda Committee Report and draft Teacher Education Curriculum Framework -2006 developed by NCTE and NCERT. The syllabi were prepared through workshop mode in which experts from different universities and the faculty of all the four RIEs participated. The syllabi have been sent to the RIEs.

Reformulation of M.Ed. Syllabus of RIEs

The programme was initiated to incorporate the epistemological shift envisaged in the NCF-2005 and the Focus Group Report on Teacher Education. The syllabus of M.Ed. was developed through workshop mode involving faculty of RIEs, NIE and Departments of Education of some universities. The syllabus of M.Phil. in Education was also developed in these workshops.

Creation of Data Base of Trained Teachers on the Use of New Textbooks Developed by NCERT based on NCF-2005

The database of trained teachers on the use of new textbooks developed by NCERT for the Classes V and VIII in all subjects based of NCF-2005 have been created.

Training and Extension

Orientation Programme for Master Trainers on the Use of New Textbooks for Classes V and VIII through Face-to-Face Mode

A four-day orientation programme for master trainers drawn from Kendriya Vidyalaya Sanghathan (KVS), Navodaya Vidyalaya Samiti (NVS) and CBSE affiliated independent schools on the use of new textbooks developed by NCERT for Classes V and VIII was organised at NIE, New Delhi, and RIEs at Ajmer, Bhopal, Bhubaneswar and Mysore through face-to-face mode from 12 May to 19 July 2008. The resource persons were drawn from NCERT, Universities, NGOs, and school teachers who have been associated in the preparation of NCF-
2005 document and textbooks. The major focus of the programme was to familiarise teachers with various features of the new textbooks, how to critically reflect on one’s own practices, how to develop critical thinking and reflective thinking abilities in the students, constructivist approach, NCF-2005, Syllabi integration between content and Pedagogy, role of theatre in education, etc. About 1300 master trainers were trained through this programme.

Orientation Programme for Teachers on the Use of New Textbooks for Classes V and VIII through Videoconferencing

The department organised orientation programme for teachers of KVS, NVS and CBSE affiliated independent schools on the use of new textbooks for Classes V and VIII through videoconferencing from 16 July to 02 August 2008. During the sessions the teachers from different parts of the country interacted directly with the textbook writers/developers and experts in different subject areas. The teachers and experts reflected on different aspects of syllabi, textbooks, evaluation and practical aspects related to transaction of the curriculum. About 7000 teachers from KVS, NVS and CBSE affiliated independent schools were oriented through videoconferencing.

All India Competition on Innovative Practices and Experiments in Education for Schools and Teacher Education Institutions

The all India competition was introduced to encourage schools and teacher education institutions to try out novel ideas and practices through team efforts for improving quality of school education and teacher education and to share their experiences with all other stakeholders.

There is a provision for 30 (20 for schools and 10 for teacher education institutions) awards to be divided equally among the five regions as per the jurisdiction of each Regional Institute of Education located at Ajmer, Bhopal, Mysore, Bhubaneswar and Shillong. Nine schools/institutions were selected on the basis of the project proposals submitted and were informed to carry out the project following the suggestions given by the experts while evaluating the project proposals. Head of the nine schools/institutions were invited to present the final report in the national seminar organised on 26-27 March 2009. The reports and presentations were evaluated by experts and four schools/institutions were awarded Rs.20,000/- each.

Publication of Journal of Indian Education and Bhartiya Adhunik Shiksha

NCERT publishes Journal of Indian Education (JIE) and Bhartiya Adhunik Shiksha (BAS) on quarterly basis for dissemination of ideas related to various aspects of school education and teacher education among teacher-educators, researchers, teachers and others concerned with education. The content of these journals include thought provoking articles, research papers, book reviews, and interviews with eminent educationists and other features.

During 2008-09, nearly 200 articles in English and 100 articles in Hindi were received for publication in these journals. The articles were reviewed by the members of Editorial Committee as well as by the NIE faculty to ascertain their print worthiness. Four issues of JIE (May 2008, August 2008 and November 2008) and five issues of BAS (July-October 2007, January 2008, April 2008, July 2008 and October 2008) are already published. One issue of JIE (February 2009) and two issues of BAS (January 2009 and April 2009) are in the process of publication.
Resource Support to DIET to Strengthen their Capabilities and Performance

The DIET, Baad, Mathura, was identified to strengthen its capacity through augmentation of its physical and academic resources to perform its expected roles more efficiently. In this regard the following activities have been carried out at DIET, Mathura: (i) the need analysis to assess the current practices to identify the specific areas of strengths and deficiencies; identification of the resources available locally to strengthen instructional practices; development of plan of action with details of academic support on the basis of identified areas of deficiencies; development of educational database of the district for planning and management. Workshops were organised for capacity building of faculty of the DIET and other functionaries of the district in preparation of institutional plan; organisation of training programmes; educational leadership; Preparation of TLM in mathematics; preparation of a book on Cultural and Natural Heritage of Mathura consisting of culture, local geography, customs, forest, flora and fauna, festivals, demography, agriculture, industries, service occupations, folk arts, etc. for the use of pre-service and in-service teachers of district Mathura.

Memorial Lecture Series on Eminent Educationists

The Memorial Lecture Series Programme was initiated to commemorate the life and works of eminent Indian educational thinkers and practitioners. The aim is to reach a large audience, create an informed public opinion, and trigger a chain of discourse and discussions thereby making education a lively subject of intellectual enquiry. In 2008-09, eight memorial lectures on the life and works of Mahatma Gandhi, Gijubhai Badheka, Rabindranath Tagore, Zakir Hussain, Mahadevi Verma, Savitribai Phule, B.M.Pugh and Sri Aurobindo were organised in the four RIEs (Bhubaneswar, Shillong, Mysore and Bhopal) and four
metropolitan cities (SNDT Mumbai, NIE, New Delhi, MIDS, Chennai and Presidency College, Kolkata). The speakers included Shri Anupam Mishr, Gandhi Peace Foundation; Professor Swapan Majumdar, Director Rabindra Bhavan Shanitiniketan; Professor T.S. Saraswathi, Maharaja Sayaji Rao University Baroda; Professor Padmini Swaminathan, Madras Institute for Development Studies (MIDS); Professor Sharmila Rege, Savitribai Phule, Women's Study Centre, University of Pune; Prof. Jasodhara Bagchai, Residency College, Kolkata, Shri P. Sainath, Rural Affairs Editor, The Hindu; and Ms. Kalpana Sharma former editor, Hindu, Mumbai edition. All the sessions of the lectures were chaired by eminent educationists. On the day of the lectures exhibitions depicting the life and work of Savitribai Phule and Sri Aurobindo were also organized in Mumbai and Kolkata. NCERT published booklets for each lecturer in English and Hindi and distributed to the audience. Each booklet consisted of two sections: Section I highlighting the purpose of the memorial lecture and providing a brief sketch of the life and works of the concerned educational thinker and Section II giving the lectures in full along with a brief background of the speaker. In addition publicity pamphlets published for each lecture with a brief about the Memorial Lecture Series, the abstract of the talk and information about the speaker. The information about the lectures placed on NCERT website.

Revival of Selected Heritage Schools

The selected heritage schools were provided academic and financial support and its impact was monitored periodically. A reporting format was prepared and progress reports received from each of the five schools. A draft dissemination pamphlet highlighting the aim of the heritage school programme, and a brief about the schools has been prepared. The proposals received from the prospective heritage schools for the second cycle are being scrutinised.

Conference of Directors of SIEs/SCERTs

Conference of Directors of SIEs/SCERTs was organised at NIE, New Delhi on 4-5 February 2009. Twenty five states participated in the conference. The discussion centred round themes/issues like strengthening of SIEs/SCERTs, implementation of NCF – 2005, strategies and modalities related to in-service training of primary school teachers under SSA, review of teacher education programmes and capacity building of SCERT faculty. Recommendations were made for strengthening of SIEs/SCERTs.

Major Contributions of the Faculty

Professor K. Dorasami, Head, coordinated the project Comprehensive Evaluation of Centrally Sponsored Scheme of Reorganisation and Restructuring of Teacher Education. He delivered valedictory address in the national seminar on Implications of National Curriculum Framework- 2005 on Teacher Education organised by St. Gregorious Teachers Training College, Wayand, Kerala, on 23 April 2008. He delivered key-note address in the national seminar on Inroads into Constructivist Pedagogy organised by Devaki Amma Memorial Teacher Education College, Chemlembra, Malapuram, Kerala, on 7-8 August 2008. He was a resource person in a workshop on Current Trends in Teacher Education and Use of Action Research Methodology for Enhancing Teachers Professional Learning organised by University of Peradeniya, Sri Lanka, from 18 to 23 August 2009.
He was Member-Secretary of the Planning Committee for organising an international conference on Teacher Development and Management and presented a paper on Bridging the Gap between Content and Pedagogy – Reflections on Field Based Experiences in India in the conference held at Udaipur from 23 to 25 February 2009 and chaired a session on Building Professionalism in Teacher Preparation/Quality in Teacher Education. He participated in a five-day workshop for designing M.Ed. curriculum based on constructivist pedagogy organised by Regional Institute of Education, Mysore from 28 March to 4 April 2009. He inaugurated the national seminar on Management of Teacher Education organised by MS University, Baroda, on April 2009. He also worked as a member of various committees of MHRD, NCERT, NCTE and Kendriya Vidyalaya Sangathan.

Professor Shakuntla Nagpal was a team member of a research study Comprehensive Evaluation of the Centrally Sponsored Scheme on Re-organisation and Restructuring of Teacher Education. She contributed in the reformulation of M.Ed. Syllabus of RIEs and development of M. Phil. syllabus. She was a resource person in the orientation programme for capacity Building of faculty of KVS, NVS and CBSE affiliated independent Schools on the use of new textbooks developed by NCERT for Classes V and VIII. She delivered the Valedictory address at State level Seminar on Enhancing Self–Culture in Education at Malwa College of Education, Ludhiana, Punjab on 12 February 2009 and in the orientation-cum-workshop on Research Methodology in Education and Use of Technology in Research organised by G.V.M. College of Education, Sonepat on 15 November 2008 where she presented a paper on Holistic Balanced Methods of Research. She was an expert in the national workshop on Trends in Practice–Teaching & Research in Education organised by Dayal Bagh Educational Institute Agra on 20-21 September 2008. She delivered the Valedictory address at State level Seminar on Enhancing Self–Culture in Education at Malwa College of Education, Ludhiana, Punjab on 12 February 2009 and in the orientation-cum-workshop on Research Methodology in Education and Use of Technology in Research organised by G.V.M. College of Education, Sonepat on 15 November 2008 where she presented a paper on Holistic Balanced Methods of Research. She was an expert in the national workshop on Trends in Practice–Teaching & Research in Education organised by Dayal Bagh Educational Institute Agra on 20-21 September 2008. She was a member of Selection Committee of Central Institute of Hindi, Education Department Punjab University, Chandigarh, as well as in PAC Committees of DIETs and SCERT Delhi.

Professor S.K. Yadav coordinated the Conference for Directors of SIEs/SCERTs held at NIE, New Delhi, on 4-5 February 2009. He completed the research project Comparative Study of Pre-Service Teacher Education Programme at Secondary Stage in India, Bangladesh, Sri Lanka and Pakistan. He is also involved in the project Comprehensive Evaluation of Centrally Sponsored Scheme on Restructuring and Re-organisation of Teacher Education. His papers on Innovations in Elementary Teacher Education was published in University News – A weekly Journal of Higher Education, Association of Indian Universities, Vol.46, No.45 November 10-16, 2008 and School Curriculum and its Evolution was published in Journal of Indian Education of NCERT in February 2009. He coordinated the international programme for capacity building of curriculum planners in elementary teacher education of Afghanistan.

Dr. Saroj Pandey, Reader, coordinated the study on Professionalism of Rural Teachers Working in Primary Schools. She also coordinated the programme for the reformulation of M.Ed. syllabus of RIEs, and development of M.Phil. syllabus to be introduced in RIEs. She was a team member for studying the Comprehensive Evaluation of Centrally Sponsored Scheme on Restructuring and Re-organisation of Teacher Education. She attended the second phase of international training programme on Child’s Rights — a Practical Approach organised by SIDA and Children’s Ombudsman, Sweden in New Delhi. She developed modules on
Research Methodology in Education for M.Phil. in Education programme of Rajshree Tandon Open University, Allahabad, and developed position paper on Teacher Education Curriculum Frameworks since 1978: A Critique for NCTE, New Delhi.

Dr. Raj Rani, Reader was the Academic Editor of two journals - Journal of Indian Education (JIE) and Bhartiya Adhunik Shiksha (BAS). She was also involved as a team member in a research study Comprehensive Evaluation of the Centrally Sponsored Scheme on Restructuring and Re-organisation of Teacher Education. She also contributed to the programmes of the department: Memorial Lecture Series, Revival of Heritage Schools, All India Competition on Innovative Practices and Experiments for School Teachers and Teacher Educators and Review and Formulation of M.Ed. and M.Phil. Syllabus.

Dr. K. Walia, Reader, co-ordinated the programme on Reformulation of 2-Year B.Ed. in RIEs. She was a member of the editorial team for the Journal of Indian Education and Bhartiya Adhunik Shiksha. She worked as team member in MHRD project Comprehensive Evaluation of Centrally Sponsored Scheme of Teacher Education.

Dr. B.P. Bhardwaj, Reader, coordinated the programme All India Competition on Innovative Practices and Experiments in Education for Schools and Teacher Education Institutions 2008-09 and organised a national seminar in March 2009 for valuation and sharing of project reports. He provided academic inputs as a team member in the research study Comprehensive Evaluation of the Centrally Sponsored Scheme on Restructuring and Re-organisation of Teacher Education. He provided inputs as member of resource team on Curriculum Reforms to SCERT Solan, Himachal Pradesh. He also provided academic guidance and input to finalise curricula, syllabii and textbook in Yoga Education for School children organised by Patanjali Yoga Peeth, Haridwar. He presented a paper Curriculum Perspective on Health Education in Schools in the national seminar on Health Education in Schools through Yoga organised by Morarji Desai National Institute of Yoga (Govt. of India) during National Yoga Week-2009. He contributed for the development of a Teachers’ Handbook for Teaching Yoga to School Children of the North- Eastern Region.

Dr. Madhulika S. Patel, Reader, co-ordinated an orientation programme for the master trainers of KVS, NVS and CBSE affiliated independent schools on the use of new textbooks developed by NCERT for Classes V and VIII in all subjects. She also coordinated orientation programme for 7000 teachers on the use of new textbooks developed by NCERT for Classes V and VIII through video-conferencing at 29 learning centers. She developed a video programme on the role /use of theatre in curriculum transaction with the help of CIET. She developed data base of trained teachers on the use of new textbooks developed by NCERT. She organised programmes for the capacity building of DIET faculty and other functionaries of the district. She developed a resource book on Cultural and Natural Heritage of Mathura for the use of pre-service and in-service teachers of the district. She also contributed in the development of M.Ed. syllabus and in a research study Comprehensive Evaluation of the Centrally Sponsored Scheme on Restructuring and Re-organisation of Teacher Education. A student was awarded Ph.D. degree under her supervision.
Dr. Anupam Ahuja, Senior Lecturer, coordinated the Memorial Lecture Series and the Revival of Heritage School programmes. She was a member of editorial team of the Journal of Indian Education and Adhunik Bhartiya Shiksha. She was a co-investigator in the research project Professionalism of Rural Primary School Teachers. She was a team member of the MHRD sponsored study Comprehensive Evaluation of the Centrally Sponsored Scheme on Restructuring and Re-organisation of Teacher Education. She presented a paper Making Inclusion a Reality: Challenges Ahead in the seminar on Activities and Emerging Roles and Responsibilities of Functionaries organised by The National Trust for Welfare of Persons with Autism, Cerebral Palsy, Mental Retardation and Multiple Disabilities, Ministry of Social Justice and Empowerment, Government of India.

She is the member of the governing body of the School of Rehabilitation Sciences, University of Delhi, at the AADI (Action for Ability Development and Inclusion). She co-edited the EENET (Enabling Education Network which is an information sharing network promoting inclusion of marginalised groups in education worldwide.) ASIA Newsletter 2nd and 3rd Quarter 2008, UNESCO. She published a paper Understanding Inclusion: Resource Material for Teacher Educators in Nurturing the Expert Within: A Handbook for Teacher Educators Central Institute of Education, University of Delhi, Delhi 2008. She contributed as part of the resource team to UNESCOs Compendium Conventions Agreements and Laws Guaranteeing All Children Equal Right to Quality Education in an Inclusive Setting ; Education Sector Response to HIV/AIDS South Asia, UNESCO 2008.

She presented a paper Research Priorities to Promote Inclusive Education at the Research Colloquium, organised by the Central Institute of Education, Delhi University, Delhi on 24 September 2008. She was a resource person to the Enabling Education Network Steering Group Meeting organised by EENET Global, Manchester University, in Manchester from 8 to 12 September 2008. She participated in the project renewal and reformulation of M.Ed. and M.Phil. programmes for the Regional Institutes of Education. She was as a resource person for EDUSAT facilitated orientation programme for practising school teachers on Gender Issues in Curricular Areas with reference to NCF -2005. She was a member of the screening committee constituted by Director NCERT to screen the papers for The National Seminar on Rural Education in Rural Areas, NCERT held on 16-17 February 2009. She was a member of the team for coordinating the international conference on Teacher Development and Management held at Vidya Bhawan Society, Udaipur, from 23 to 25 February 2009.