ACTIVITY REPORT 2011-2013

Report Authors
Aminur Rahman
AKM Fazlur Rahman
Asma Ul Hosna
Sangeeta Barua

Centre for Injury Prevention, Health Development and Research, Bangladesh (CIPRB)

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Letter from Executive Director

It gives me an immense pleasure to publish the Third Phase Activity Report 2011-2013 of the Centre for Injury Prevention and Research, Bangladesh (CIPRB) and share with you highlights and successes from these years.

Founded in 2005, CIPRB is a not-for-profit organization that achieves its mission through four approaches: conducting research to find solutions for health problems, developing human resources, implementing programmes to serve peoples, and to advocate policy makers to maximise the value and impact of the research activities. During the third phase, CIPRB had two main focuses, reducing childhood drowning, and improving maternal and child health.

Vision realised in childhood drowning prevention

A remarkable achievement has been made in child drowning prevention. Anchal, a community crèche, and SwimSafe, a survival swimming teaching to children 4 years and over, are the two major innovations of CIPRB to prevent drowning. Global injury researchers now consider these innovations as important means to address child drowning not only in Bangladesh but also in similar settings. To continue research on drowning prevention, CIPRB established International Drowning Research Centre-Bangladesh (IDRC-B) in collaboration with the Royal Life Saving Australia and The Alliance for Safe Children with the financial support from Australian Government Aid Programme. IDRC-B conducted various child drowning prevention research which increased the wealth of knowledge in the field of drowning prevention. In search of further solutions for preventing drowning among under 5 children, CIPRB collaborated with icddr,b and Johns Hopkins University and has been conducting an implementation research titled “Saving of Lives from Drowning (SoLiD)” in Bangladesh. Anchal and play-pen are the two interventions. About 80,000 children under 5 have been enrolled in the study. In mid 2015 this research will provide some new information about the preventability of these interventions. We are happy that the Bloomberg Philanthropies has come forward to provide the financial support for this project.

CIPRB in collaboration with UNICEF has been conducting SwimSafe, a survival swimming teaching programme for children 4 years and over since 2006. Survival swimming teaching is an important intervention to prevent child drowning. Over these years about 350,000 children learnt swimming skills.

To prevent drowning in the sea, CIPRB initiated SeaSafe programme in collaboration with Royal National Life Boat Institution (RNLI). Training of the life guards, patrolling in the beach and community awareness on beach safety are the important components of the programme.

Innovations in Maternal and Child Health

Recently the CIPRB has expanded its research and programme areas beyond injury prevention. The centre has also been involved in conducting research and implementing programmes to ensure better health and wellbeing for the most vulnerable – mothers and children.

CIPRB initiated Maternal and Perinatal Death Review (MPDR) project in 2010 with the support of UNICEF and Directorate General of Health Services (DGHS) and has been continuing till date. This particular project has been appreciated by the government and development partners. MPDR helps to locate and notify maternal, neonatal and still births by the existing government community level health workers. Then the causes of these deaths are assigned through verbal autopsy method. The data that have been generating through this project has strengthened the national Health Management Information System (H-MIS). Currently the project has been expanded in 10 districts of the country.
The CIPRB has also become engaged in improving the quality of maternal and neonatal health (MNH) care. Bangladesh had implemented a Joint GoB – UN MNH Initiative in 4 districts of Bangladesh in order to accelerate progress in maternal and neonatal care to reach the goals and targets under MDG 4 and 5 by time and beyond. Major challenges still lie with utilization of facilities for MNH care and its service quality. CIPRB with technical support from WHO Bangladesh has conducted a baseline study to assess the status of the district and upazila level health facilities in regards to availability and quality of MNH services in 2011. In the following year CIPRB developed standards, guidelines and tools for quality improvement system in MNH services. The centre has been implementing the intervention in the health facilities of the two districts namely, Thakurgaon and Jamalpur since June 2013. The findings of the study will be available in early 2014 and it is expected that the “system” that has been developed will be effective in improving the quality of MNH care in the district and below level health facilities in Bangladesh.

The organisation also conducted research on maternal and child nutrition and other public health issues during this period.

One of the mandates of the CIPRB is to develop human resource through training. Till 2013 over 450 surgeons were trained on emergency management of severe burn. With the help of Australia & New Zealand Burn Association (ANZBA) and Interplast Australia & New Zealand, CIPRB has been conducting Emergency Management of Severe Burn (EMSB) training.

Considering the importance of improving essential obstetric care and newborn care (EOC-NC), CIPRB collaborated with Liverpool School of Tropical Medicine to implement Making it Happen phase 2 to train the health professionals on live saving skills on EOC-NC. We believe that the trained health professionals will make a great contribution in reducing maternal and newborn health.

Over the last three years the centre has contributed a lot to enrich science and also by serving the vulnerable group – children and women. However, none of these would have been achieved without the commitment and expertise of colleagues at the CIPRB whose dedication, skill and care has underpinned the success and quality outcomes. I believe that CIPRB is remarkably driving forward in the research and programme field to improve health and wellbeing in Bangladesh, regionally and globally. I would expect that government, development partners and donors will continue their cooperation in the coming years.

We gratefully acknowledge Steve Parker, Meagan Brotherton and Tony Morisset for English language edited of the report.

Prof. Dr. AKM Fazlur Rahman
Executive Director
### Abbreviations

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<tr>
<th>Abbreviation</th>
<th>Full Form</th>
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<tr>
<td>ACE</td>
<td>Awareness, Community Involvement and Education</td>
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<td>A&amp;T</td>
<td>Alive and Thrive</td>
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<td>BHIS</td>
<td>Bangladesh Health and Injury Survey</td>
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<td>BSF</td>
<td>Bangladesh Swimming Federation</td>
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<td>CBLSC</td>
<td>The Cox’s Bazar Lifesaving and Surf Club</td>
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<td>CIPRB</td>
<td>Centre for Injury Prevention, Health development and Research, Bangladesh</td>
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<td>CPR</td>
<td>Cardiopulmonary Resuscitation</td>
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<td>CSI</td>
<td>Community Swimming Instructor</td>
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<td>DGHS</td>
<td>Directorate General of Health Service</td>
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<td>DGFP</td>
<td>Directorate General of Family Planning</td>
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<td>EmOC</td>
<td>Emergency Obstetrics Care</td>
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<td>EmONC</td>
<td>Emergency Obstetric and Newborn Care</td>
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<td>EMSB</td>
<td>Emergency Management of Severe Burn</td>
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<td>FTF</td>
<td>Feed the Future</td>
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<td>icddr,b</td>
<td>International Centre for Diarrhoeal Diseases Research, Bangladesh</td>
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<td>IDRC-B</td>
<td>International Drowning Research Centre – Bangladesh</td>
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<td>IYCF</td>
<td>Infants and Young Child feeding</td>
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<td>JICA</td>
<td>Japan International Cooperation Agency</td>
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<td>LLP</td>
<td>Local Level Planning</td>
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<td>LMIC</td>
<td>Low and middle income country</td>
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<td>LSTM</td>
<td>Liverpool School of Tropical Medicine</td>
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<td>LSS-EOC &amp; NC</td>
<td>Life Saving Skills-Emergency Obstetric Care and Newborn Care</td>
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<td>MCWCs</td>
<td>Maternal and Child Welfare Centers</td>
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<td>MDA</td>
<td>Mass Drug Administration</td>
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<td>MDG</td>
<td>Millennium Development Goal</td>
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<td>MiH2</td>
<td>Making it Happen 2</td>
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<td>MNCAH</td>
<td>Maternal newborn child and adolescent health</td>
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<td>MMR</td>
<td>Maternal Mortality Ratio</td>
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<td>MNH</td>
<td>Maternal and Newborn Health</td>
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<td>MOHFW</td>
<td>Ministry of Health and Family Welfare</td>
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<td>MPDR</td>
<td>Maternal and Perinatal Death Review</td>
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<td>NMR</td>
<td>Neonatal Mortality Rate</td>
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<td>OGSB</td>
<td>The Obstetrical Gynaecological Society of Bangladesh</td>
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<td>PRECISE</td>
<td>Prevention of Child Injuries through Social-intervention and Education</td>
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<td>QI</td>
<td>Quality Improvement</td>
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<td>RLSSA</td>
<td>Royal Life Saving Society Australia</td>
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<td>RNLI</td>
<td>The Royal National Lifeboat Institution</td>
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<td>SoLiD</td>
<td>Saving of Lives from Drowning (SoLiD) in Bangladesh</td>
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<td>TASC</td>
<td>The Alliance for Safe Children</td>
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<td>TQM</td>
<td>Total Quality Management</td>
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<td>Upazila Health Complexes</td>
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<td>UNICEF</td>
<td>United Nations Children’s Fund</td>
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<td>United Nations Population Fund</td>
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<td>WHO</td>
<td>World Health Organization</td>
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Centre for Injury Prevention, Health Development and Research, Bangladesh (CIPRB)

Vision

That the community, especially the underprivileged in Bangladesh and other developing countries are able to lead healthy and injury-free lives in a safe environment.

Mission

Our mission is to provide appropriate information, methods, technologies and services for ensuring safety, improving health and promoting social development in Bangladesh and other developing countries.

Values

We believe
- research is the gateway for improving health and social development, particularly in under resourced settings
- underprivileged groups need special attention to improve their quality of life
- in a skilled workforce being the key for the effective implementation of our mission
- in respecting gender equity, cultural diversity and high ethical standards in our work
- our work can have national, regional and international influence
- in transparency in all aspects of our work.

Strategies

Our strategies in achieving the mission include
- conducting research to generate evidence
- developing a skilled workforce
- providing quality services to the community
- educating people through advocacy and communication
- engaging communities through networking and collaboration.

CIPRB Centres

The CIPRB accomplishes its vision and mission through the following centres

- International Drowning Research Centre-Bangladesh (IDRC-B)
- Centre for Burn Prevention and Research
- RTi Research Centre
- Centre for Reproductive and Child Health
- Centre for Education and Training
- Division of Public Health Sciences and Injury Prevention.
CIPRB Innovations

Anchal
Anchal is a micro institute within a community where vulnerable children under the age of five receive education, health and development from a trained female caregiver for 4 hours a day. Anchal protects children from injury hazards as well as providing vital early childhood development.

SwimSafe
SwimSafe is a survival swimming education programme for children over 4 years of age. CIPRB research has shown that swimming education through SwimSafe has saved many children from drowning, the leading cause of death of children in Bangladesh.

Death Mapping
Maternal and perinatal death mapping is an innovation of CIPRB which helps local level managers to identify high risk locations and to strengthen maternal and neonatal health services to prevent these unwanted deaths.
CIPRB Research
Injury Prevention Research

Child Drowning Prevention Research

Between 2011 and 2013 the International Drowning Research Centre – Bangladesh (IDRC-B) of CIPRB conducted significant research activities. The summary of the research activities are described below.

International Drowning Research Centre Bangladesh (IDRC-B)

Through the Bangladesh Health and Injury Survey (BHIS) and the Prevention of Child Injuries through Social Intervention and Education (PRECISE) project it was identified that drowning is a major killer and is preventable. After implementing the PRECISE programme, drowning was reduced by more than 25%. This provided the impetus for developing another groundbreaking research centre, the IDRC-B.

This centre has been initiated by Centre for Injury Prevention, Health Development and Research, Bangladesh (CIPRB) in collaboration with the Royal Life Saving Society Australia (RLSSA) and The Alliance for Safe Children (TASC). The IDRC-B was started following a series of research projects conducted by CIPRB, TASC and in partnership with UNICEF. These projects identified the scale of drowning in communities in Bangladesh. The partners recognized the need to focus on the drowning research component of the PRECISE programme in order to ensure that:

- interventions were thoroughly researched, plans were developed and implemented to share these insights with partners in Bangladesh and across the region
- sector capacity was built in order to develop national programmes for drowning prevention.

The IDRC-B project started its activities in 2009 for three years and completed its first phase in 2012. Following the success of the first phase, activities were extended to December 2013.

Research that was undertaken included:

Surveying Optimum Time for Anchal Operation to Prevent Childhood Drowning

An Anchal is a child crèche centre established within a local community, using locally available facilities. It uses an existing centrally located household within a cluster of 40-60 houses, and has suitable space for 20-25 children.

Anchal was a key component of the successful PRECISE project. During the PRECISE project children of 18 months to 5 years were kept under supervision for four hours (9 am to 1 pm) a day, six days a week. The PRECISE project showed that the children who participated in the Anchal were 82% less likely to drown than those who did not participate in the programme. The aim of the IDRC-B study was to see if the opening times of the Anchal programme were optimal to prevent drowning and practical for mothers running the centres.

For the IDRC-B study 151 Anchals were developed across three different unions of Raiganj. In each union there were 50 Anchals. One model Anchal was established in Raiganj. Different opening and closing hours for the Anchals were trialed in each union. In Bromogacha, Chandaikona and Dhangora unions the times of operation were from 9am to 1pm (4 hours a day), between 10am and 12 pm (2 hours a day) and 10am to 2pm (4 hours a day) respectively.

In March 2011 the IDRC-B recruited and trained 302 Anchal Ma’s (caretakers of the children) and Anchal Assistants (to assist the caretakers), three supervisors and one monitoring officer. Children in the Anchals were taught using a programme that used a wide variety of activities designed to teach and practice developmental skills. Each month a parents meeting was organized in each Anchal, and this provided an opportunity for the parents to discuss various safety developments and social issues.

From the interviews with the mothers of the children it was understood that they were happy to send their children to the Anchal. For the majority (60%) of mothers their preferred timing for the opening of the Anchal was between 9am and 1 pm, during their busy hours.

It could be concluded that the four-hour duration of Anchal is more protective for children in terms of injury and drowning prevention and considering the mothers’ opinions, 9 am to 1 pm is the most suitable timing.

Teaching Children how to Swim Increases Exposure to Water or Risk-Taking when in the Water: Emerging Evidence from Bangladesh

The SwimSafe programme has been taught to large numbers of children in Bangladesh. This study examined whether SwimSafe graduates have increased exposure to water or high risk practices in water compared to children who learned swimming naturally from their peers.

Trained interviewers obtained detailed water exposure histories for the preceding 48 hours from 3,936 SwimSafe graduates aged 6-14 and 3,952 age and sex-matched children who had learned to swim naturally.
Frequencies of water exposure and water entries for swimming or playing were compared.

There were 10,994 entries into water among the 7,888 participants in the 48 hours prior to the interview. About one third (31.2%) had no water entries, one tenth (10.2%) entered once, half (49.1%) entered twice and a tenth (9.6%) entered three or more times. Proportions of children in each group were similar. About 99% of both groups only entered the water for bathing. For those entering to swim or play, the mean number of entries was similar (SwimSafe 1.23, Natural swimmer 1.22, P=0.60). There was no difference in swimming or playing alone in the water between the two groups. Most water exposure for children is for bathing. Only about one percent swam or played in the water during the 48 hours recall period.

The study suggested that learning how to swim through the SwimSafe programme did not increase water exposure, nor did it increase recreational water entry for playing or swimming compared to children who learned to swim naturally from their peers.

Children Reporting Rescuing other Children Drowning in Rural Bangladesh – A Descriptive Study

This study examines the frequency and characteristics of rescues reported by children who graduated from SwimSafe and compares them with age and sex-matched children who did not participate in SwimSafe.

Interviews were conducted during the swimming season in Raiganj, Bangladesh. Data was collected from 3,890 SwimSafe graduates aged 6-14. Two age and sex-matched controls were selected; one who had learned to swim naturally, the other who hadn’t learned to swim. 188 rescues were reported by the groups. Children reported frequent drowning rescues of younger children in rural Bangladesh. The most reported were contact rescues with the rescuer in the water. Our study suggested that formal training for in-water rescue techniques may be needed within the SwimSafe curriculum to reduce the risk to a child rescuer.

Feasibility of a First Responder Programme in Rural Bangladesh

The aim of this study was to develop and implement a first responder training programme, assess the feasibility of training lay persons with low literacy in rural Bangladesh and determine the acceptability of the programme in the community.

A first responder training programme, including cardiopulmonary resuscitation (CPR), was developed covering 20 villages in a rural sub-district in north-central Bangladesh. 2,398 participants received training and 2120 graduated over a 14 month period. Responders were a mix of adolescents, community volunteers and community elders.

The programme was evaluated through post-training assessment of knowledge and skills of participants and performance evaluation of trainers. A focus group discussion was used to assess the response of community leaders to the usefulness and community acceptance of the programme.

Materials developed for training include a low-literacy training manual, posters and a training video. Almost 90 percent (88.4) of participants qualified in post training assessment. Adolescents and community volunteers had higher pass rates than community elders. In all, CPR skills showed a significant decline over 9 months of assessment, while first aid knowledge appeared stable over the same period. Community leaders considered the programme useful for the community and expressed their support for the programme.

The study suggested that developing a first responder training programme that includes CPR in a rural Bangladesh community is feasible if participants have secondary school attainment. Adolescents and young adults are suitable candidates. Evaluation is ongoing to see whether the programme graduates were able to reduce morbidity and mortality through effective first response efforts.

Feasibility of Portable Pools for Survival Swimming Training in Bangladesh

The IDRC-B imported portable pools to test the feasibility of teaching the SwimSafe programme to children in urban areas where ponds are unavailable.

During April 2011 the centre installed two portable pools in two sites in Dhaka city - one at a school in Agargaon and the other in a community area in Mirpur. The children who enrolled to learn to swim were from local schools.

After getting a huge positive response from the community, the IDRC-B has since installed two more portable pools in Dhaka, one at Mohakhali and another in Amin Bazar.

Saving of Lives from Drowning (SoLiD) in Bangladesh

Saving of Lives from Drowning in Bangladesh (SoLiD) is an implementation study established to deliver efficacious interventions to prevent and reduce the burden of childhood drowning in rural Bangladesh.

The Johns Hopkins University in collaboration with the Centre for Injury Prevention Health Development and Research, Bangladesh (CIPRB) and International Centre
Three are in CIPRB’s field areas namely, Raiganj, Sherpur Sadar and Manohardi, and the other four are North Matlab, South Matlab, Daudkandi and Chandpur Sadar which are the intervention areas of icddr,b. Eligible children are those between the ages of 9 – 36 months, and are residents in the selected areas. The project will benefit about 284,000 households and also provide injury surveillance for more than 1.2 million people.

Road Safety Research

Speed Management and Safe Crossings on N2 Highways

The problem of road traffic accidents is large, fast-growing and its impact on the health and economy of Bangladesh is enormous. However, preventing road traffic accidents receives less attention than other causes of death. In Bangladesh nearly 70% of road fatalities occurred on rural sections of the main highways and the metropolitan cities only accounted for approximately 20%. Over 80% of fatalities are vulnerable road users e.g. pedestrians, cyclists, motorcyclists and users of unsafe and informal public transportation. This project is one of the first in a LMIC to consider small-scale measures for Speed Management including traffic calming in rural areas. The programme will be implemented in Narsingdi district in three different locations namely: Nilkuthi, Namapara and Kunderpara.

CIPRB analyzed traffic crash and death, speed and user behavior on the N2 highway in Bangladesh. Before and after study using three methods with 3 control locations for speed measurement has been implemented. Through exclusive field visits, stakeholder analysis and discussion with local and international experts, detailed intervention plans are being prepared.

The programme will be implemented by black spot or high risk location identification, analyzing and adjusting the Traffic and Injury Pattern and designing a safe road or section for the road users.

The project will be implemented in two components:

1) Awareness, Community Involvement and Education (ACE)
the major public health and social problems in most low-income countries. Bangladesh is not an exception, and the extent of the problems children experience is enormous. To explore the views towards child abuse and neglect, CIPRB in collaboration with Karlstad University, Sweden have been conducting a study to assess the nature and level of the child maltreatment problem in Bangladesh. This research work has been running among Bangladeshi children and their families to gain their perspectives. Qualitative methods for this study include in-depth interviews and key informant interviews. Children of 9-17 years, parents of 9-17 year old children, school teachers and child rights professionals are the study population. Possible participants from different socio-economic groups and urban-rural settings have been selected.

The specific objectives are to investigate attitudes and perceptions toward abuse and neglect, to investigate the degree and role of the polyvictimization problems to examine the association between maltreatment and the nature of child physical injuries and finally to assess children’s conditions in terms of abuse and neglect in the workplace and its role in physical injuries.

The study will be completed by the end of 2014.

Suicidal Ideation Among Adolescents in Rural Bangladesh

Suicide is an enormous public health problem around the world. Each year approximately 1 million people worldwide die committing suicide, making it one of the leading causes of death. World Health Organization (WHO) reports indicate that suicide accounts for the largest share of the intentional injury burden in developed countries. A population-based surveillance programme in a rural community in southwest Bangladesh revealed that suicide is a major cause of mortality, especially in young females. Among young people, 10-19 years old, suicide accounted for 42% of deaths; 89% of suicide-associated deaths in this age group were female.

Other Injury Research

Children and Their Families' Views on ‘Child Abuse’ and ‘Child Neglect’

As in most low-income countries, information and data related to child maltreatment in Bangladesh are limited. The information related to child abuse and child neglect that is unveiled today is mostly either reports by newspapers or derived from governmental and different development organizational reports. However, these reports indicate that child maltreatment is one of
The experience in Thakurgaon was encouraging and effectively implemented. DGHS, DGFP, UNICEF, UNFPA, WHO, CIPRB and professional experts recognized its successful implementation with visibility and positive outcomes, and it was unanimously recommended for scale up. DFID and UKaid provided necessary funds for the project from 2010 to mid-2012 and the remainder of 2012 was funded by the Canadian CIDA. In the October 2013 – September 2015 phase, the Department of Foreign Affairs, Trade and Development (DFATD) Canada extended their financial support to implement the intervention in 10 districts of Bangladesh including Thakurgaon, Jamalpur, Narail, Moulvibazar, Panchagarh, Sirajganj, Bagerhat, Netrokona, Bandarban and Cox’s Bazar districts of Bangladesh.

MPDR is covering a population of approximately 18 million people in 70 sub-districts under ten mentioned districts. The intervention is also covering 70 facilities at Upazila level (Upazila health complex), 10 district hospitals and 11 Maternal and Child Welfare Centers (MCWCs).

Death Mapping:

Death notification under the Maternal and Perinatal Death Review (MPDR) system is identifying the death of a mother during pregnancy through childbirth to 42 days after birth, and their neonates (including the still births from the community).

Death mapping in maternal and perinatal deaths is an innovation of CIPRB and a useful tool for maternal and neonatal health improvement. Death notification is a function utilizing all opportunities of the existing health system, extending collaborations between GOs, NGOs and the local community including volunteers.

While implementing MPDR death notification, the district / Upazila map was plotted with multi-coloured dots showing the residences of the deceased mothers (red), neonates (yellow) and still births (blue). It indicates the incidence and distribution by geographic and administrative location within the district providing the district health / family planning managers with an understanding on maternal and neonatal health situation in the area. Identification of areas with a high incidence of deaths informed and enabled the health and family planning managers to create a specific remedial action plan in those areas and implement the MPDR. Death mapping within MPDR also influences the policy makers at the national level to know the magnitude of mortality in some remote or hard to reach areas where people are underprivileged.
Key findings of MPDR during 2010-2012

MPDR has notified maternal, neonatal deaths and still births which has given a clear picture of maternal and neonatal health status in Thakurgaon, Jamalpur, Narail and Moulvibazar districts. Some of the areas within the district have highly focused on death mapping. Kashipur union of Ranishonkoil Upazila in Thakurgaon is one of the best examples to demonstrate the benefits of MPDR data.

The trend of maternal mortality ratio (MMR) and neonatal mortality rate (NMR) has been calculated from the death notification data and has shown that in Thakurgaon, Narail and Jamalpur districts, maternal and neonatal deaths have reduced at least 10% between 2011 and 2012.

The data also gave an evidence of performance of the MNH initiative in the district. Moreover, districts like Moulvibazar also reported maternal and perinatal deaths from previously under reported remote places, such as from tea garden catchments. Verbal autopsies of deaths in the last three years showed that the community is still struggling with delays in decision making and in transferring patients from the community. Moreover, the community is still doing home deliveries by untrained birth attendants or by relatives. Data also highlighted to health managers that most of the neonatal births in the community died

Kashipur Case Study

An excellent example of death mapping innovation by CIPRB has been the use of MPDR death notification data in policy decision making and programme implementation to improve maternal and neonatal health in Kashipur of Thakurgaon district. Mapping of deaths showed Kashipur had peak incidence of maternal, neonatal deaths and still births during 2010. Of a total of 39 deaths notified, 4 were maternal deaths, 20 neonatal and 15 still births.

The results were discussed at the national level MPDR sharing meeting on 1st November 2010. The Line director ESD, DGHS requested the local authority to act immediately in Kashipur. The Community clinic in Kashipur was renovated and a trained community birth attendant was deployed. The clinic started providing MNH services. 200 normal vaginal deliveries have been conducted since its upgrading during 2011-2013. About 20-30 mothers come every month to receive antenatal care. The community has also given strong support.

One of the villagers has donated a piece of land to expand the Community Clinic building. The local authorities renovated the clinic into a ten beded hospital in 2012. The MPDR data changes the paradigm; in 2012 no maternal death occurred in this union. Kashipur is an evidence-based example in reducing maternal and neonatal mortality.

Photo: Kashipur used death mapping findings to improve MH services
within the first six hours of birth and mothers died mostly due to postpartum hemorrhage and eclampsia. Such findings provide an evidence based appropriate action through the MNH initiative. Demonstrated examples to use facility level MPDR data were found in Thakurgaon, Narail and Moulvibazar districts. A lack of blood facilities at the hospital was found as a reason for death in a number of maternal deaths with post-partum hemorrhage in Thakurgaon. In response the district management established a donor club and encouraged people in the locality to participate. One of the noteworthy results was in saving one mother in 2011 by providing 19 bags of blood for Thakurgaon district hospital. Other results include:

- 24hrs pathology test services are made available in Narail district hospital: Initiative taken based on facility death review findings
- Blood donor club / list establishment in Thakurgaon and Moulvibazar to meet needs of blood supply in blood bank
- Health camps and awareness meeting organized by health/FP department in places where maternal and neonatal deaths reported higher in 2012
- Local level planning (LLP) of MNH districts of UN utilize MPDR data to prepare MNH district plan for 2013-15
- MPDR data present in the district MNH coordination meetings in four MNH districts
- MPDR data has been incorporated into the Health Management Information System (HMIS) health bulletin of DGHS in 2012
- MPDR findings have been shared at national level to DGHS and DGFP, partners, and stakeholders.

#### What excellence experienced

- Death notification through GoB Field staff
- Death mapping identifies vulnerable areas
- Verbal autopsies explore medical and social causes of deaths and service gaps
- Facility death review forms a basis to improve quality of care
- Data initiated to feed into the MIS
- Data utilized during LLP in the intervention districts
- Yields with best practices, better outcome in ground-visible

### Nutrition Research

CIPRB has a diversity of research work. Along with injury prevention and maternal and child health research the organization is also interested in Nutrition.

### Baseline Survey for Integration of Nutrition Interventions in MCH Programme at Sylhet District

Malnutrition in children under two years is a major public health concern in Bangladesh. Despite significant improvements in child health, levels of malnutrition in Bangladesh are still amongst the highest in the world. Both dietary intakes and infectious disease are causal factors for under nutrition and both are closely interlinked. Poverty is an important factor but not always the most important.

To strengthen the nutrition component in existing programmes for maternal, neonatal and child health, Alive and Thrive (A&T) planned to collaborate with Save the Children in the Sylhet region in the Mamoni Project.

The goal of A&T is to reduce stunting, increase prevalence of exclusive breastfeeding, and improve complementary feeding practices for children 6-24 months. As part of improving complementary feeding, A&T is promoting the use of soap and water for hand washing before food preparation and feeding of young children.

To determine the effectiveness of the nutrition intervention for infants and young children a baseline and endline survey was conducted before and after implementing the intervention programme.

### Infants and Young Children Feeding (IYCF) Integration in Maternal and Child Health Programme: Experience from Rural and Urban Setting in Bangladesh

Malnutrition is a major cause of death and illness in low income countries and contributes to 1 million deaths among children annually. It contributes to 60% of the under five deaths in low income countries and alone accounted for half of the global loss of DALYs (Faruque et al., 2008). Bangladesh was found to be one of the countries with the highest rate of malnutrition.

Considering the existing need in the field of child nutrition, BRAC in collaboration with Alive & Thrive integrated IYCF/nutrition activities in the existing programmes for maternal, neonatal and child health. The goal of integration is to improve the nutritional status of the children by increasing prevalence of exclusive breastfeeding, and improving complementary feeding practices for children 0-24 months.

The study was designed to assess the effectiveness of integration of the IYCF intervention in the existing MNCH and MANSII programme. A panel cohort design was adopted in this study. Four cohorts were formulated in this study, 2 for urban and 2 for rural settings in Bangladesh. The study was conducted between September 2012 and October 2013.
In order to improve IYCF knowledge and practice, the SHIKHA project was designed as a multi-faceted programme, consisting of home visits, health forums, social mobilization, media campaign and engaging trained community workers in every village by BRAC. Also a media campaign was conducted to target remote villages in these 26 Upazilas. This study was designed to evaluate and monitor the SHIKHA intervention for giving strategic direction quality improvement.

Health System Research

Baseline Assessment for Introducing a Quality Improvement System in MNH Services in Facilities of Thakurgaon and Jamalpur Districts of Bangladesh

With the ultimate goal of enhancing reduction of maternal and neonatal deaths at district and Upazila level health facilities through introducing a “Quality Improvement (QI)” System in MNH services, a baseline assessment was conducted by the CIPRB research team in December 2011.

This survey was conducted in three different types of facilities: District Hospitals, Maternal and Child Welfare Centers (MCWCs) and Upazila Health Complexes (UHCs) in two districts: Jamalpur and Thakurgaon. Data was collected using both quantitative and qualitative methods.

Findings of the survey are presented as infrastructure and basic facilities, cleanliness and infection control, essential and emergency drug supply, information management and record keeping, administration, management and referral system etc.

Development of Standards, Guidelines and Tools for Quality Improvement System in Maternal and Neonatal Health Services in Two Districts of Bangladesh

Bangladesh had implemented a Joint GoB–UN MNH Initiative in 4 districts of Bangladesh in order to accelerate progress in maternal and neonatal care to reach the goals and targets under MDG 4 and 5 by time and beyond. Major challenges still lie with utilization of facilities for MNH care and its service quality. CIPRB with technical support from WHO Bangladesh has conducted a baseline study to assess the status of the district and Upazila level facilities in regards to availability and quality of MNH services.
It was accomplished as part of the pilot intervention: “Introducing Quality Improvement System in Maternal and Neonatal Health Services in District and Upazila Hospitals of Bangladesh: Piloting in Two Districts”. The process of development of mechanisms, standards, guidelines and tools for QI intervention is operational in two of four MNHI districts: Thakurgaon and Jamalpur. The activity was implemented from May 2012 to October 2012.

The activities included: establishing an organizational framework for implementation, supervision and monitoring at national and local level, adaptation and development of strategy, MNH standards, guidelines, tools and checklists for implementation of QI scheme, capacity building for QI implementation and supervision.

**Piloting of a Quality Improvement System in Maternal and Neonatal Health Services in Two Districts of Bangladesh using Standards, Guidelines and Tools Developed**

CIPRB, in collaboration with WHO Bangladesh, has been implementing a system for improvement of quality of care in Maternal and Neonatal Health services (MNH) in government health facilities from June 2013. The system and tools were developed by CIPRB with technical support from WHO and approved by the DGHS. The system is under implementation through the existing government health system under both the directorates. The intervention is being implemented in District Hospitals, Maternal and Child Welfare Centres and Upazila Health Complexes of Thakurgaon and Jamalpur Districts since 1 June 2013 for 12 months.

**Survey on Clients’ and Providers’ Satisfaction at the Total Quality Management (TQM) Hospitals of Bangladesh**

Bangladesh has achieved remarkable progress in population and health and experienced a steady decline in maternal and under-5 child mortality in recent decades. Availability and utilization of Maternal and Newborn Health (MNH) services either at community or facility are still low.

To improve the quality of care, the Safe Motherhood Promotion Project (SMPP II) in partnership with Ministry of Health and Family Welfare (MOHFW) and supported by Japan International Cooperation Agency (JICA) has introduced the 5S-KAIZEN-TQM system. Using the principles of 5S (sort-set-shine-standardize-sustain) and the participatory KAIZEN (Continuous Quality Improvement: CQI) process the four intervention district Hospitals namely Narshingdi, Shatkhira, Pabna and Jessore feed and monitor inputs towards quality improvement.

The objective of this survey was to assess the current situation and patients and providers satisfaction in those areas. Both qualitative and quantitative methods were adopted in the survey. Qualitative methods were conducted by two anthropologists by using pretested guidelines. Data was collected from 31st December 2012 to 20th January 2013.

Through this survey it was revealed that the out-patient and in-patient clients of the TQM hospitals of Narshingdi, Shatkhira, Jessore and Pabna were satisfied with the services that they received. However, the level of satisfaction was different at each hospital. In all four districts, clients of out-patient department (OPD) were found to be dissatisfied with the dispensing of drugs, and clients of in-patient department (IPD) were dissatisfied regarding the explanation of prescribed drugs and dosages by the health care providers. The level of outpating clients’ satisfaction was found higher in Narshingdi district compared to other district hospitals. In all the hospitals the health care providers were satisfied with their job and had similar level of satisfaction. However, huge workload, shortage of human resources, often a lack of appreciation from patients and external pressure make the health care providers dissatisfied with their job. To overcome the situation the TQM activities need to be strengthened in all the four hospitals.

**Report on Ex-Post Situation Study on Japanese Grant Aid Project for Support to Strengthening of Emergency Obstetrics Care (EmOC) Services**

The Health, Nutrition and Population Sector Programme (2003-2010) of the health policy of the Government of Bangladesh, focused EmOC services as one of the main strategies for reducing maternal mortality. In collaboration with UNICEF in expanding medical facilities, the Government of Bangladesh requested assistance from the Government of Japan in 2001 for strengthening EmOC facilities for the Upazila Health Complexes (UHC) throughout the country.

In response to the request from the Government of Bangladesh, the Government of Japan provided the grant aid for Comprehensive EmOC equipment to 47 UHCS and Basic EmOC equipment to 192 UHCS in 2003-2004. Also provided were the tools for repairing medical equipment to National Electro-Medical Equipment Maintenance Workshop and Training Centre (NEMEW&TJC) in Dhaka and District Electro-Medical Equipment Maintenance Workshop (DEMEW) in 18 districts. This ex-post situation study examined the current status of the equipment and tools provided by Grant Aid to UHCS, NEMEW&TJC or DEMEWs as well as their maintenance status and recommended appropriate measures in this regard.
Other Research

Post-Mass Drug Administration (MDA) Coverage Survey 2012 for Elimination of Lymphatic Filariasis

In Bangladesh the National Lymphatic Filariasis Elimination Programme was started in 2001 with an ultimate goal to eliminate Filariasis from Bangladesh by 2015. The purposes are to interrupt transmission of infection and to alleviate and prevent the suffering and disability produced by the disease. To eliminate filariasis, the MDA programme was initiated in 2001 in the highly endemic northern region of Bangladesh.

In 2012, the 12th round was implemented. DGHS and JICA selected CIPRB to conduct the post-MDA coverage survey in the northern districts Panchagarh, Thakurgaon, Nilphamari, Lalmonirhat, Kurigram and Rangpur of Bangladesh.

Bangladesh Urban Health Landscape Analysis

Bangladesh is one of the most densely populated countries in the world. During the last few decades there has been a massive migration of population from rural areas to the urban areas. These migrations occur due to push and pull factors. Poverty, poor environmental condition, lack of safe water and sanitation, and social and cultural problems due to unplanned urbanization all affect the health of the urban dwellers especially the vulnerable groups – poor, women and children. Urban primary health facilities seem to be significantly inadequate in terms of coverage and quality.

Various public agencies, private facilities and NGOs provide health care to the urban population. However, the health indicators including fertility rate, maternal, neonatal, infant and child mortality rates are still high and women and children suffer from malnutrition. On the other hand antenatal and postnatal care coverage is low with the majority of women giving birth at home with untrained traditional birth attendants. To improve the situation there was a dire need to thoroughly analyze the urban health policies and programmes, service delivery system, especially for maternal, newborn and child health care.

Objectives of the study were to:

- explore the existing national health related policies and urban health policies/strategies, urban health services including primary health care with a special focus on maternal, newborn and child health care
- find the gaps in urban health policies, strategies and services
- share the findings with the relevant policy makers, implementers, donors and other stakeholders to strengthen urban health programming.

To achieve the objectives relevant documents were reviewed and different techniques of a qualitative method were utilized. Key informant interviews were conducted with policy planners, development partners and donors; in-depth interviews were conducted with programme heads and facility level managers of public, private and NGOs; focus group discussions were conducted with facility service providers and beneficiaries; observation technique was used to assess the environment of different facilities.

For key-informant interviews, in-depth interviews and focus group discussions, pre-tested guidelines were used. To observe the health facilities one observation checklist was also used. Four research assistants conducted focus group discussions. One research coordinator coordinated the overall research activities and conducted key-informant interviews.

To maintain the quality of the research, instruments were pre-tested in the field, data collectors were trained and CIPRB senior level managers supervised during data collection. Transcripts of the audiotapes of key-informant interviews, in-depth interviews and focus group discussions were prepared and then analysis was done by examining the transcripts and notes taken during interviews in detail to identify the range of ways in which the interviewees or respondents responded to various issues.

The responses were divided into various themes and coded manually. Summary analysis were then prepared according to each theme. The study was conducted between June and August 2012. The ethical clearance for the study was obtained from the CIPRB’s ethical approvals body.
CIPRB Programmes
SwimSafe

SwimSafe is a survival swimming education programme for children over 4 years of age. The guiding principles of the programme are to involve the local community and use locally available low cost resources. CIPRB research has shown that swimming education through SwimSafe has saved many children from drowning, the leading cause of death of children in Bangladesh.

Bangladeshi children learn swimming skills in unsafe open water bodies like ponds, ditches, rivers and lakes without any qualified swimming instructor or any lifeguards. Many of the children learn swimming in the ponds with the help of their peers or relatives or often they learn by themselves. Learning swimming through this process often exposes them to danger. To protect children from drowning it is essential that they should learn swimming skills in a safe environment under the supervision of a trained instructor through a structured lesson. Considering this, CIPRB with the support of TASC, RLSSA and BSF designed a structured swimming teaching programme called “SwimSafe” for children in Bangladesh. Later, UNICEF provided financial support for the implementation of the programme in Bangladesh.

Children learn swimming in a modified pond by Community Swimming Instructors (CSIs). Ponds are modified by installing a bamboo structure as a safe venue for teaching children swimming. To develop the SwimSafe venue locally available materials like bamboos and ropes are used. In urban areas swimming pools are used.

A manual was developed with the support of BSF coaches and the experts of the RLSSA. CIPRB in collaboration with BSF developed a group of master trainers for the SwimSafe programme. Each year CIPRB conducts refresher training for the trainers. After training the trainers move to the district level to train the instructors in the community. CSI select 15 children from the baseline with the support of the supervisor for lessons. Three groups of 5 children in each, practice 20 minutes of swimming lessons under supervision. It usually takes 14 lessons to complete the programme. A total of 21 steps were identified to learn the survival swimming skills. Through the SwimSafe programme children must swim at least 25 meters, float in the water for at least 30 seconds and perform rescue techniques.

To raise community awareness CIPRB conducts courtyard meetings and yearly swimming competitions among the children. The responsible supervisor with the support of the instructor conducts the training and community people including parents and children are invited to participate in the meeting. The supervisor delivers information about the importance of swimming learning and the SwimSafe programme. To raise awareness of the programme the CIPRB also conducts swimming competitions in the community. SwimSafe graduates participate in these competitions.

Since 2006 the SwimSafe programme has trained 2,961 instructors and over 340,000 children have been graduated on life saving swimming skills across 18 different districts of Bangladesh.
SeaSafe

Since 2011 the Royal National Lifeboat Institution (RNLI) and CIPRB have worked in partnership to develop and implement a comprehensive drowning prevention strategy for coastal areas of Bangladesh, Cox’s Bazar, through the SeaSafe programme. The focus until now has been to develop and build the operational capacity of a local volunteer organization called the Cox’s Bazar Lifesaving and Surf Club (CBLSC). Over the past two years the CBLSC has matured with enough capacity to deliver and maintain volunteer patrols and provide quality lifesaving training for new and existing volunteers and external organizations. Within this time 68 lifeguards have been trained, 8 lifeguards instructors trained and 30 coastguards trained in basic lifesaving education. The SeaSafe programme has developed and promoted a water campaign targeting the tourism sector, reaching 10,000 people.

Emergency Management of Severe Burn (EMSB)

EMSB in Bangladesh is an international course that has also been run in the UK, Australia, New Zealand, Africa and many other countries in the world for the last 17 years. With the help of Australia & New Zealand Burn Association (ANZBA), Interplast Australia & New Zealand, CIPRB and other distinguished burn professionals are conducting the course in Bangladesh. Along with Australian faculties all of the 41 instructors are organizing this course voluntarily in Bangladesh.

Since 2008, through this training 450 surgeons, plastic surgeons and the physicians who are managing burn injuries in Bangladesh were trained and among them 41 have been trained as instructors. Along with Bangladeshi physicians and surgeons, 5 surgeons and plastic surgeons from Nepal were also trained.

Implementation of Making it Happen 2 (MiH2) in Bangladesh

Bangladesh has made significant progress towards MDG 4 and 5. To accelerate reduction of maternal and neonatal mortality, the country needs to enhance access to skilled care during child birth and obstetric and neonatal complications.

The ‘Making It Happen’ programme aims to reduce maternal and newborn mortality and morbidity (MDG 4 and MDG 5) by increasing the availability and improving the quality of Skilled Birth Attendance (SBA) and Emergency Obstetric and Newborn Care (EmONC). Liverpool School of Tropical Medicine (LSTM), UK and CIPRB are jointly implementing the ‘Making it Happen-Phase 2’ (MiH2) programme (2013-2015) under the policy support and guidance of the Line Director, MNCAH, DGHS and Line Director, MCRAH, DGFP of the government. The Obstetrical Gynaecological Society of Bangladesh (OGSB) is also providing technical assistance. A national coordination committee chaired by Line Director, MNCAH, DGFP was formed on 20th July 2013 and provided support and supervision.

The programme applied evidence-based training, using proven adult education techniques, together with improved supervision and data management. The LSS-EOC & NC training package was developed by LSTM and Royal College of Obstetricians and Gynaecologists in collaboration with the Department of Making Pregnancy Safer at WHO. The training programme will be implemented in the following hospitals and their referral medical college hospitals.

Population coverage:

<table>
<thead>
<tr>
<th>Name of intervention districts</th>
<th>Population coverage (x 1000)</th>
<th>Govt. Hospitals at District level</th>
<th>Number of Upazila Health Complex (UHC)</th>
<th>Referral Medical College Hospital (MCH)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Panchagarh</td>
<td>981</td>
<td>2 (DH, MCWC)</td>
<td>4</td>
<td>Dinajpur &amp; Rangpur</td>
</tr>
<tr>
<td>Sunamganj</td>
<td>2,443</td>
<td>2 (DH, MCWC)</td>
<td>9</td>
<td>Sylhet</td>
</tr>
<tr>
<td>Sirajganj</td>
<td>3,072</td>
<td>2 (DH, MCWC)</td>
<td>8</td>
<td>Bogra</td>
</tr>
<tr>
<td>Borguna</td>
<td>882</td>
<td>2 (DH, MCWC)</td>
<td>4</td>
<td>Barisal</td>
</tr>
<tr>
<td>Potuakhali</td>
<td>1,517</td>
<td>2 (DH, MCWC)</td>
<td>6</td>
<td>Barisal</td>
</tr>
<tr>
<td>Bagerhat</td>
<td>1,461</td>
<td>2 (DH, MCWC)</td>
<td>8</td>
<td>Khulna</td>
</tr>
<tr>
<td>Total</td>
<td>16,130</td>
<td>20</td>
<td>36</td>
<td>6</td>
</tr>
</tbody>
</table>
The major MiH-2 activities include (i) Baseline survey for mapping HR and EmONC services (ii) Training of HCPs (iii) National capacity building (TOT) (iv) M&E in intervention hospitals (v) Quality of Care (QoC) (vi) Organizing workshop on Confidential Enquiry on Maternal Death.

As part of the programme already implemented a baseline survey was undertaken in government hospitals (DH, MCWC, UHCs) of 6 districts and their referral 6 medical college hospitals on 22nd July, 2013. The baseline assessment recorded the current status of those facilities on availability and quality of EOC-NC care/services in addition to human resource mapping in maternal and neonatal health care.
Training, Workshop, Seminar and Conference
Dr. Mashreky attended the workshop on “Healthy Kitchen and Healthy Cities” in Katmandu, Nepal

During 9th-11th December 2013, Dr. Mashreky attended the workshop on Healthy Kitchen and Healthy Cities in Katmandu, Nepal. He was invited as a technical expert from Bangladesh. The objective of the workshop was to identify major health issues and their corresponding risk factors in the kitchen and develop a framework for intervention. The proposed intervention ideas that all the partners had come up with were presented in a session on final day. Dr. Prabin Mishra, Secretary of State, Ministry of Health and Population, and potential donors and the partner organizations attended the final session. Dr. Mishra appreciated the project and its focus on the health of the urban poor. He urged everybody to think of “health beyond health” and focus on the factors that influence health.

Meeting with Johns Hopkins University, U.S.A.

On September 17 and 18, 2013 Prof. Dr AKM Fazlur Rahman, Executive Director, CIPRB and Dr Animesh Biswas, Team Leader, SoLiD project visited Johns Hopkins University, U.S.A. to discuss the working updates and future planning of the CIPRB’s current project Saving of Lives from Drowning (SoLiD) in Bangladesh. On 18 September 2013, Dr Rahman delivered his lecture on “Capacity Building in Injury Prevention in Bangladesh, CIPRB Experiences”. Around 25 participants attended the lecture session.

Workshop on “Baseline survey training, Life Saving Skills (LSS) for EmOC training

A workshop on “Baseline survey training, Life Saving Skills (LSS) for Emergency Obstetrics Care (EmOC) training was held on 22 July 2013 under the project titled Making it Happen 2 (MiH2)” at ICMH, Matuail, Dhaka.

Engineer Arif Uddin attended Transportation Planning and Safety Training

Engineer Arif Uddin, Project Coordinator, Road Safety attended the 23rd International course on planning and safety arranged by the Transportation Research and Injury Prevention Programme (TRIPP) at the Indian Institute of Technology, New Delhi, India from 03-10 December, 2013. More than 65 participants from 10 countries participated in the programme.

Lifeguard training in Cox’s Bazar sea beach

In 2012 CIPRB, in collaboration with RNLI, UK developed the SeaSafe programme to prevent drowning amongst tourists and local inhabitants in the Bay of Bengal. Through the SeaSafe programme 15 coastguards and 30 lifeguards received lifeguard training during October 2012.

In 2012 school and community safety activities were also included in this programme. Over 600 school children and tourists were made aware of beach safety.
Dr. Jahangir received training at RNLI, UK

Dr. Md. Jahangir Hossain, SwimSafe Team Leader of CIPRB, received training on Future Leadership in Life Saving at the Royal National Lifeboat Institution (RNLI), UK from 9th August - 26th August 2012. Participants from seven countries attended this course. Dr. Hossain was one of the few from Bangladesh who received this training.

RNLI in collaboration with CIPRB has implemented the SeaSafe Programme. One of the main components of the SeaSafe Programme is to build capacity within the local people to lifeguard in the Cox’s Bazar beach area. The training that Dr. Hossain received will equip him to design, implement, expand and evaluate the SeaSafe Programme.

CIPRB organized and participated in the training on Near Accident Methodology

Training on Near Accident Methodology was held during 21-26 May 2013 at CIPRB conference room. The training was facilitated by Dr. Ir. A. Richard A. van der Horst, from Safe Crossings, The Netherlands. Prof. Dr. Md. Mazharul Haque from BUET was the chief guest at the inaugural ceremony of the training. Purpose of the training was “to provide training in near-accident methodology: a leading methodology for the measurement of road safety at black spots.”

Stakeholder meeting in Malaysia: Dr Rahman was invited by University Putra Malaysia (UPM)

Prof. Dr. AKM Fazlur Rahman, Executive Director, CIPRB attended a stakeholder meeting on Drowning Prevention Among Children in Malaysia on 09 October 2013 organized by Safe Kids Malaysia, Faculty of Medicine and Health Sciences, University Putra Malaysia (UPM). As one of the global leading experts in drowning prevention, Dr. Rahman was invited by UPM to join the meeting. He delivered the presentation on “Childhood Drowning Prevention: Bangladesh Experiences”.

Global Conference on Child Injury Prevention

Prof. Dr. AKM Fazlur Rahman, Executive Director, CIPRB and Dr Animesh Biswas, participated in the “Global Conference on Child Injury Prevention” dated September 19 and 20, 2013 at Columbus, U.S.A.

Dr. Mashreky and Dr. Atiqul Haque attended workshop and research meetings in Karlstad University, Sweden

Dr. Saidur Rahman Mashreky and Dr. Atiqul Haque attended workshop and research meetings in Karlstad University, Sweden, during October 2-10, 2013. The trip was part of the Swedish Research Links Programme supported by SIDA and Swedish Research Council. The Swedish Research Links Programme aims to support universities/research organizations promoting research collaboration between countries.
Researchers from Bangladesh and Sweden discussed, planned and evaluated the ongoing research projects and the progress of the research cooperation.

“Quality Improvement System in MNH Services in Two Districts of Bangladesh”

An inception and planning meeting for implementation of the programme was held in CIPRB conference room on 10 June 2013. Dr. Syed Abu Jafar Md. Musa, Director, PHC & Line Director-MNCAH, DGHS, representatives from DGFP, WHO, UNFPA, UNICEF along with CIPRB members were present at the meeting.

Dr. Mashreky participated in American Burn Association annual meeting

Dr. Saidur Rahman Mashreky, Director, CIPRB, attended 45th annual meeting of American Burn Association (ABA) as an invited speaker in Palm Spring California during 22nd and 26th April 2013. He presented three presentations in the meeting.

Advocacy Meeting at Jamalpur

Dr. Mashreky presented a paper in the meeting

QI Advocacy meeting

The first Advocacy meeting of the “Quality Improvement System in MNH Services in Two Districts of Bangladesh” was held at Jamalpur district on 24 June 2013 with the Civil Surgeon, consultants from Obs-Gyn and pediatrics of Sadar Hospital, MO-Clinic of MCWC, Upazila Health and Family Planning officers of Jamalpur district and representatives from UN organizations and CIPRB.

Lesson learnt from MPDR 2010 – 2011 has been shared to district MNH committee in presence of honorable minister

MPDR findings 2010 -2011 was presented in district MNH committee in Thakurgaon on 4th December 2011. Analytical findings of MPDR were shared and compared with 2010. Maternal and neonatal health status is improving, maternal deaths number reduced in 2011 than 2010.

Mr Ramesh Chandra Sen, Honourable Minister for Water Resources was the Chief Guest of the ceremony. Other participants included DC, SP, DDFP, UN officials and chairmen from all upazilas, UHFPO / UFPO from upazilas, consultants, doctors and nurses.
Dr. Mashreky attended 16th Congress of International Society of Burn Injury in Edinburgh, UK

During 9th-13th September 2012 Dr. Mashreky attended the 16th Congress of International Society of Burn Injuries (ISBI) as an invited speaker in Edinburgh, UK. Dr. Mashreky’s presentation in the education committee meeting on burn management and education was from a low income country perspective. In a plenary session he presented “Fire Disaster is a Silent Epidemic in Low Income Countries: Needs Special Attention”. He presented in a free paper session on “Experience from community based childhood burn prevention programme in Bangladesh: implications for low resource setting”. Dr. Mashreky chaired the session on mass casualties and disaster management.

Director, Primary Health care & Line Director, MNCAH of DGHS monitored MPDR in Moulvibazar and Thakurgaon districts

In Moulvibazar on 12th July 2012, Dr. Syed Abu Jafar Md. Musa, Director, Primary health care & Line Director, MNCAH of DGHS visited Sreemangal health complex to monitor and review MPDR system in the primary health care centre. He showed his satisfaction to see the system is functioning effectively to capture deaths and review to find out causes. Dr. Musa also meets with district managers in the district MPDR review meeting in Moulvibazar Civil Surgeon office. On 6th August 2012, Line Director visited field activities of MPDR system in Ranishankoi upazila of Thakurgaon district in where he attended a social autopsy of a neonatal death. Moreover, the Line Director joined in a meeting at Civil Surgeon conference room in Thakurgaon with the district and upazila health managers and MPDR findings of the district presented.

During his visit Dr. Musa mentioned that MPDR has been piloted in Thakurgaon, the evidence has been generated through death notification. “Maternal, neonatal deaths reports are now reporting, we come to know high deaths areas within the district. Moreover, the district health and family planning managers can take remedial action plan based on death mapping and implement for improvement of maternal and newborn services of the district” LD spoke in the district meeting.

CIPRB Participated in the National Public Health Conference

CIPRB participated in the National Public Health Conference (NPHC) on 13-15 January, 2013 at Radisson Blu Water Garden Hotel, Dhaka. The main theme of the conference was coordinated multi-sectoral approach to sustain health achievements and meeting 21st century public health challenges.

In the scientific session, CIPRB scientists presented their research works on different public health issues. Prof. Dr. AKM Fazlur Rahman, the Executive Director, presented an abstract on Road Accidents and Injury Prevention Dr. Aminur Rahman, Director of IDRC-B, presented Cost-Effectiveness of an Injury and Drowning Prevention Programme in Bangladesh. Dr. Saidur Rahman Mashreky, Director of Public Health and Injury Prevention presented Experience from community based childhood burn prevention programme in Bangladesh: Implication for low resource setting; Prof. Dr. M. A. Halim, Director of Reproductive Child Health, presented An Analysis of Verbal Autopsies in 305 Maternal Deaths captured by Maternal and Perinatal Death Review System in 4 Districts of Bangladesh. Dr. Animesh Biswas, Team Leader of Maternal Health Programme, presented Social autopsy - A social intervention to aware community on maternal and neonatal deaths in Bangladesh.

International Conference

IDRC-B was thrilled to participate in the World Conference on Drowning Prevention in Danang, Vietnam from 10-13 May, 2011. The team shared our knowledge and experience with global water safety experts and provided evidence that drowning prevention is possible in the low income setting of Bangladesh. Dr. AKM Fazlur Rahman participated as an Ambassador for the conference, and IDRC-B hosted a stall to personally share our experiences with delegates.
CIPRB Researchers Attended World Conference on Drowning Prevention in 2013

Three drowning prevention researchers namely Dr. Aminur Rahman, Dr. Mohammad Jahangir Hossain and Dr. Animesh Biswas participated and presented scientific research papers in world conference on drowning prevention in Potsdam, Berlin in 20-22 October 2013.

A total of five papers related to drowning prevention in Bangladesh were presented by the researchers.

Dissemination Seminar on PRECISE: A Comprehensive Child Injury Prevention Research in Bangladesh

CIPRB Disseminated “Prevention of Child Injuries through Social Intervention and Education” (PRECISE) programme results in a workshop on the 29th November 2011 in Dhaka. The Honorable Minister Prof. Dr. A.F.M Ruhal Haque, Ministry of Health and Family Welfare, Government of People’s Republic Bangladesh was the chief guest of the event. He expressed that the results from the PRECISE should be used to scale up injury prevention programmes throughout Bangladesh.

Prof. Dr. Fazlur Rahman, Executive Director, CIPRB, Mr. Carol De Roy, UNICEF Representative; Mr. Arun Thapa, WHO Representative; Dr. Zafor Ullah, Deputy Programme Manager, Arsenic and Injury Prevention also presented at the event.
Annual Events
Awareness Built up Among Scouts

CIPRB raised awareness on injury prevention among scouts from 9th February, 2011. CIPRB was involved in each of the 7 days of the event with a stall to let the children and community know about the importance of injury prevention and CIPRB’s work. Over the days of the Camporee, 9,000 scouts took part along with 1,000 leaders.

CIPRB Celebrated National Safe Motherhood Day

The Millennium Development Goal (MDG) 5 has set a target for reducing maternal mortality to 109 per 100,000 live births. Achieving MDG 5 is not only an important goal in itself, it is also central to the achievement of the other MDGs: reducing poverty, reducing child mortality, stopping new HIV infections, providing education and promoting gender equality.

National Safe Motherhood Day was observed in Bangladesh on 28 May 2013, organized by The Directorate General of Health Services (DGHS). The theme for this year was Safe Delivery is a Woman’s Right. CIPRB in addition to injury prevention activities works on maternal health and was invited by DGHS to celebrate the event of National Safe Motherhood Day. CIPRB staff participated in a rally celebrating the event. The rally was started from the National Museum, Shahbagh and ended at Shishu Academy.

Rally on National Safe Motherhood Day
Awards and Recognition
Award from International Congress of Paediatrics

CIPRB has won the first prize for the research paper “Cost-Effectiveness on an Injury and Drowning Prevention Programme in Bangladesh” presented by Prof. Dr AKM Fazlur Rahman, Executive Director, CIPRB at 27th International Congress of Pediatrics (ICP) 2013, held on 24-29 August 2013 in Melbourne, Australia.

The ICP 2013 focused on promoting and improving child and adolescent health and setting it as a priority on the world agenda, specifically on “bridging the gaps in child and adolescent health”. More than 5,000 international leading experts in the field of Pediatrics joined together, and presented opinions, strategies, methodologies, treatment gaps and practices concerning pediatrics and also adolescent health care.

Royal Life Saving Society member

In December 2011 CIPRB became a member of the Royal Life Saving Society – Commonwealth.

Dr. Animesh Won Second UN Global Road Safety Week Photo Contest

CIPRB professional Dr. Animesh Biswas won first place in an international photo competition on Second UN Global Road Safety Week photo contest of The Johns Hopkins International Injury Research Unit (JH-IIRU).

The winning photo has been displayed on the Face- book cover page of The Johns Hopkins International Injury Research Unit link: https://www.facebook.com/JohnsHopkinsInternationalInjuryResearchUnit

Dr. Kamran Achieved PhD

Dr. Kamran ul Baset successfully achieved his PhD from the University of the West of England, Bristol, UK. His study area was 'Road traffic injury prevention in children in rural Bangladesh'. Professor Elizabeth Towner was his Director of Studies and the CIPRB Executive Director, Dr. AKM Fazlur Rahman, was his advisor. The CIPRB family celebrated his achievement with pride.

CIPRB Doctoral Fellows

Dr. Farzana Islam

Dr Farzana Islam (MD, MPH), Research Associate, CIPRB has been enrolled in PhD programme at the Department of Medical Science with a Specialisation in Healthcare Sciences, Örebro University, Örebro, Sweden in September 2012. Her PhD programme is supervised by Associate Professor Koustuv Dalal, Professor Charli Eriksson of Örebro University, Sweden, and Dr. Aminur Rahman and Prof. Dr. AKM Fazlur Rahman of CIPRB.

Farzana with her teachers and course mates at Örebro University, Sweden
Her research title is “Designing a model quality improvement system for maternal and neonatal health care at facilities in Bangladesh: implication for low income countries.”

Farzana has been conducting her research work in the CIPRB research field. During September to December 2013 she completed a part of her course work at Örebro University, Sweden for partial fulfillment of the doctoral programme.

Md Talab Completed his PhD Part-1

Md. Abu Talab, Senior Statistician and Demographer of CIPRB, completed his PhD Part-1 from Jahangirnagar University in 2013. The title of his research activity is “Causes and consequences of morbidity and mortality due to injuries in Bangladesh-Implication for development countries”.

Media Coverage

1. On 08 September, NTV - a renowned television channel in Bangladesh broadcasted a video clip featuring a drowning scenario which is a major killer among the children in Bangladesh. Dr. Aminur Rahman, Director, International Drowning Research Centre-Bangladesh (IDRC-B) was interviewed in this instance.

2. Video clip on drowning report
   Interview of Dr. Aminur Rahman, Director, International Drowning Research Centre-Bangladesh (IDRC-B) telecasted ekattor.tv news dated 14 September 2013.

3. Feature published in daily newspapers
   - Daily ProthomAlol, 26 May 2013
   - Daily Janata, 22 September 2013
   - Daily Ittefaq, 28 June 2013
   - Daily Janakontho, 27 December 2013
   - Weekly Shonar Bangla, 16 March 2012

CIPRB’s research works and findings have been highlighted by different TV channels with interest in different topics

Success Story

A Local Hero Masud Rana

A stroke patient, Ripon, suffering from TIA suddenly became unconscious with whole body rigidity. His breathing was feeble. Md. Masud Rana, one of CIPRB’s trained respondents from ICDR-B was called to help him and started applying CPR and immediately asked the people around to call for a transport mode to take the patient to hospital. The doctors also said that it would have been impossible to save the patient’s life if he had not been taken to the hospital.

A few days previously he helped a person who was stabbed in the thoracic area with a long dagger. He didn’t pull it out. Just put pressure on the site with clean cloths and took him to hospital. Both the patients are now alive and almost completely healed.

It became Masud Rana’s habit to help people who needed him. Hats off to Masud Rana!

A Life is Saved: a Facility Death Review Action: Thakurgaon District Hospital

The death review meeting at the District Hospital identified from the facilities death review and agreed standard procedure (ASP) checklist that if only blood can be readily available, some of the 12 deaths which occurred in the district hospital in 2010 could have been averted. The meeting decided and established a blood bank, storing blood bags and a network of volunteer donors to meet any emergency. The effort of June 2011 resulted in a significant outcome by averting the death of Mrs. Kohinoor, 19 years, of Bongaon, Ranishankoil who was referred to Thakurgaon Sadar hospital on 13 August 2011 for profuse bleeding following delivery. She was saved by transfusing 19 bags of whole blood provided by the district hospital donor club though MNH initiatives. The facility death review within the MPDR system has provided an excellent opportunity to find out the constraints/gaps and to provide mother and neonatal services at the facility and provide a platform to determine how death can be averted.
Our first goal was to see if it was feasible to introduce CPR training in a low-resource environment. To do this we developed training materials, trained trainers, and rolled the programme out to over 2,000 people. Among other things, I also developed surveys and analyzed data on over 20,000 children to assess how frequently they enter water. We wanted to see if children who completed the IDRC-B SwimSafe programme were more likely to enter water than those who learnt from their friends.

I want to utilize my experience from Bangladesh and continue to stay involved in the research and development of drowning prevention programmes, particularly in low-income countries.

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International fellow

Tom Mecrow, the first drowning research fellow of IDRC-B, joined the team in September 2011 as a Research Fellow. He holds a masters degree in Public Health in Developing Countries and has completed his thesis on ‘Drowning as a global public health issue’. He has previous experience in working on public health issues in South Africa and Sudan. He has played a key role in the design, implementation and analysis of a number of research projects at IDRC-B, including the First Responder and risk taking behavior projects.

Tom Mecrow

His thoughts on the drowning prevention interventions and research currently being implemented by IDRC-B

“My experience with the IDRC-B has been amazing. Drowning is a major epidemic across Asia, and the IDRC-B is working hard to quantify the problem in a public health perspective, and come up with sustainable solutions. It is incredible that such a small organization has contributed so much to our knowledge of the problem. Living in Bangladesh has been an experience that I’ll never forget. Despite the poverty its people are very welcoming and generous, and always willing to help if you need anything!

I was involved in helping to set up a number of research projects at the IDRC-B. The largest was the development of a CPR training programme for rural villagers. There has been almost no research conducted on the effectiveness of CPR in developing countries.
Governing Structure
Financial Report
## Financial report of 2011-2012
### Consolidated Income and Expenditure Account

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<thead>
<tr>
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<th>2012</th>
<th>2011</th>
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</thead>
<tbody>
<tr>
<td><strong>INCOME:</strong></td>
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<tr>
<td>Donor Grants</td>
<td>83,824,653</td>
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<td>Cost recovery</td>
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<td>Bank &amp; FDR Interest</td>
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<td>Amortization of fixed assets</td>
<td>303,188</td>
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<tr>
<td>Sale of Wastage</td>
<td>-</td>
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<tr>
<td>Subscription</td>
<td>-</td>
<td>10,350</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>101,235,455</td>
<td>81,189,095</td>
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<table>
<thead>
<tr>
<th></th>
<th>2012</th>
<th>2011</th>
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</thead>
<tbody>
<tr>
<td><strong>EXPENDITURE:</strong></td>
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<tr>
<td>Programme cost</td>
<td>14,871,217</td>
<td>13,440,585</td>
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<td>Personnel Cost</td>
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<td>Training Expense</td>
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<td>Administration Cost</td>
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<td>Travel and DSA</td>
<td>6,755,241</td>
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<tr>
<td>Seminar, Meeting, Workshop and Conference</td>
<td>5,405,158</td>
<td>5,624,402</td>
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<td>Monitoring and Evaluation</td>
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<td>2,689,062</td>
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<td>Consultancy and Professional fees</td>
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<td>127,250</td>
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<td>Depreciation</td>
<td>1,594,276</td>
<td>1,324,027</td>
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<td>Excess of income over expenditure</td>
<td>13,093,354</td>
<td>10,888,790</td>
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<tr>
<td><strong>Total</strong></td>
<td>101,235,455</td>
<td>81,189,095</td>
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</tbody>
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Collaborative Partners

CIPRB has collaborative partnerships with different national, international academic institutions and organizations which include:

Alive and Thrive
AusAid (the Australian Agency for International Development)
Australian New Zealand Burn Association (ANZBA)
Bangabandhu Sheikh Mujib Medical University (BSMMU)
BRAC
Centre for Mass Education in Science (CMES)
Directorate General of Family Planning (DGFP)
Directorate General of Health Services (DGHS)
Family Health International 360
icddr,b
Japan International Cooperation Agency (JICA)
Johns Hopkins University
Karlstad University
Karolinska Institutet
Liverpool School of Tropical Medicine (LSTM)
Örebro University
Plan-Bangladesh
Royal Life Saving Society Australia (RLSSA)
Royal National Lifeboat Institution (RNLI)
Save the Children
The Alliance for Safe Children (TASC),
Australian Safe Communities Foundation (ASCF)
United Nations Children's Fund (UNICEF)
United Nations Population Fund (UNFPA)
World Health Organization (WHO)
University of British Columbia
University of Texas
University of the West of England