

WBPCB INITIATIVES TO PROMOTE AWARENESS

SECTION I

WBPCB ENVIRONMENTAL CAMPAIGN 2004-2005

The West Bengal Pollution Control Board (WBPCB) has been consistently focussing on implementing the various environmental Acts and Rules, in order to protect the overall environment of the state of West Bengal. However, the Board realised that it is not possible to protect the environment without public awareness and participation. With this view, it launched the Environmental Campaign on environment, forest and wildlife on June 5, 2003. The campaign, broadly divided into two categories, awareness-raising and operational, addresses target groups as diverse as school and college students, government officials, research institutions and the general public. Since then, by means of several awareness programmes, the Board has been instrumental in information dissemination, awareness building

and mobilising public support on environmental issues.

Ever since the launch of the campaign, the Board has conducted more than 200 programmes awareness programmes, which serve as a forum for awareness building, devising strategies to combat pollution and to assess the impact of the campaign. During the time period 01.04.2004 to 31.03.2005, the Board has conducted 93 programmes on seven themes, namely:

- a) Campaign against plastic waste;
- b) The Biodiversity Campaign;
- c) Quieting Noise Pollution;
- d) Fostering Knowledge on Forests & Wild Life
- e) Studying Environment

- f) Nature, natural resource, environment and society;
- g) Personal Hygiene and public health.

These programmes were highly publicised and were attended by people from all quarters. The key collaborators of the Campaign included government departments, non-governmental organisations, educational institutions, research bodies and many others. However, the main target group of the campaign was the students: our future torchbearers.

As tabulated below, a total number of 93 events were conducted under the Environmental Campaign and Operational Programme of the WBPCB during the year 2004-2005.

TABLE 2.9.1
NO. OF EVENTS CONDUCTED UNDER THE
WBPCB ENVIRONMENTAL CAMPAIGN
DURING 2004-2005

Sl. No.	Themes	No of programmes
1.	Campaign against plastic waste	26
2.	Bio-diversity	04
3.	Noise Pollution	07
4.	Forest and wildlife	07
5.	Learning about our environment	17
6.	Nature, natural resources, environment & society	21
7.	Personal Hygiene & Public Health	11
	Total	93

A brief summary of the above-mentioned events is given in ANNEXURE V.

a) Campaign against plastic waste

● *WBPCB Awareness Programmes on the ban on plastic carry bags*

As evident, the Board has imposed blanket

ban on the use of plastic carry bags in different **heritage/tourist sites** of West Bengal. In order to enforce the ban order in these sites, the Board made a series of routine and surprise on-site visits to these places. In order to intensify the campaign, the Board, during these visits, interacted with various people to evolve solution to the problems identified and started bringing together the people who felt strongly against the menace caused by plastic waste. During the visits, the WBPCB officers, the concerned authorities, representatives of NGOs, and in some cases, the officers-in-charge of the local police stations, discussed various site-specific problems in the enforcement of the ban order. NGOs and school children voluntarily participated in several awareness programmes held within these sites and these programmes were found to have positive impact on the masses. Various mechanisms were adopted to make the public aware of the ban order. Such methodologies include displaying notice boards carrying the message of the ban, arrange for checks at the entry points of the sites and make provisions for proper waste management within the site. Also, in order to enforce the blanket ban on the use of plastic carry bags in **ecologically fragile areas** of the state, the Board conducted three awareness programmes in such areas.

● *Workshops on viable alternatives to plastic carry bags*

Carry bags made of paper, cloth, jute and other eco-friendly materials can be used as



Orientation workshop for manufacture of biodegradable carry bags

alternatives to non-biodegradable plastic carry bags. In order to promote the use of such biodegradable bags, various workshops were held in North Bengal (Darjeeling & Siliguri), Kolkata and Kalyani. During the training sessions of these workshops, the participants were briefed about the various aspects (such as costing of the bags, marketing strategies etc) of undertaking projects on the manufacture of paper bags. The workshops comprised of the demonstration of the method of manufacturing paper carry bags. Each participant learnt the method and prepared two/three bags on their own under the guidance of the trainers.

● *Managing the PET Bottle Waste*

Indiscriminate disposal of Polyethylene terephthalate (PET) bottles used in the packaging of soft drinks and drinking water is an emerging environmental problem in Kolkata and its adjoining areas. Statistics reveal that in West Bengal, the total amount of PET bottles generated is about 350 tonnes per month, with an appalling 140 tonnes being generated from Kolkata alone.



*Discarded PET bottles being put in a crusher
(PET flakes shown in inset)*

No proper unit for the recycling of PET bottles existed in the whole of eastern India for long. The process of recycling followed an unscientific method that ended up in unauthorised bottling by unscrupulous people. Proper disposal of used PET bottles, therefore, was thought the responsibility of the manufacturers both from an environmental and resource-saving point of view. The manufacturers have an Extended Producer Responsibility (EPR) - a concept that is now universally accepted.

Keeping this in view, a core committee was formed with the representatives of the WBPCB and the Indian Association of PET Manufacturers (IAPM), in order to work out an action plan to tackle the collection and recycling process of PET bottle waste in West Bengal. Based on an urgent need to formulate proper disposal facilities for the purpose of recycling the huge quantum of PET waste generated, this effort helped to bring the "actors" together in order to devise a 'cradle-to-cradle' solution to the indiscriminate littering of PET bottles in the state.

In June 2003, when the issue of finding a viable solution to the safe disposal of PET bottle littering was first taken up, only two PET bottle crushers, namely Zodiac Auro International and Conveyor & Ropeway Genius Pvt. Ltd. were operating in the city. These two PET bottle crushers could, however, meet only 18 per cent of the total amount of PET bottle generated in the city. While the capacity of Zodiac Auro was 20 tonnes per month, the monthly capacity of Conveyor & Ropeways was only 5 tonnes. Soon after the Core Committee was formed, two more crushing units, namely M/s Murugan Commercial Pvt. Ltd. and M/s Enviro Form Plastics Motor Industries were set up.

Arihant Traders, a Mumbai-based firm made the necessary arrangements to collect the bottles, compact and transport them to Chennai. Meanwhile, Zodiac Auro increased the production capacity considerably. Recently, Zodiac

Auro International has set up another unit for crushing at Agarpara, North 24 Parganas with a capacity of 30 tonnes. Also, Enviro-Form Plastic has increased their capacity from 5 tonnes to 30 tonnes per month.

TABLE 2.9.2
AN ACCOUNT OF THE PET BOTTLE
DISPOSAL SITUATION OF WEST BENGAL
AS ON MARCH 2005

Name of the Crusher	Capacity (in Tonnes)
Zodiac Auro International 34B, Pasupati Bhattacharya Road, Behala, Kolkata-700043	30
Zodiac Auro International Agarpara unit	65
Conveyor & Ropeways Services Pvt. Ltdl 75C, Park Street, Kolkata-700 016	5
Enviro Form Plastic Garia Main Road Kolkata - 700 084	40
N-viron Polymers Howrah	30
Pratik Enterprise Delhi Road, Srirampore	12
Total	182

b) The Biodiversity Campaign

Nature is fascinating and encompasses a variety of life forms. It is imperative for us, especially for the children and youth - who are our future - to understand and appreciate the components of nature in order to love and protect it. The understanding of biodiversity is also important for the physically and mentally challenged children who have been deprived of the vitals of life. Some unique events on biodiversity was particularly framed to develop skills amongst these special children, required for making discriminations in form, shape, sound, touch, habits and habitats, and

identification of the different species of plants and animals which they are not familiar with. In order to promote the concept of biodiversity among students, various events were conducted under the WBPCB Environmental Campaign during 2004-2005, a summary of which is given below.

● *Setting up of Parasar Udyan, an Experimental-cum-Medicinal Plant Garden*

On April 13, 2004, an Experimental-cum-Medicinal Plant Garden was inaugurated at Bidhannagar College Campus, Salt Lake in collaboration with the Action for Food Production (AFPRO), a Guawahati-based NGO. A rainwater harvesting system that was set up by the WBPCB earlier is existing in the same campus. This twin project has been designed in a way that the rainwater collected from the water harvesting system could be used for the medicinal plant garden. The rainwater harvesting system was framed by constructing low-cost ferro-cement structures. Water harvesting tanks were built; the capacity of each tank being 12000 litres and the approximate cost being Rs. 22,000 per tank. These tanks hold the rainwater coming from the rooftop of these buildings. The rainwater collected in these tanks is used to grow and nourish the medicinal plants in the garden.



*A medicinal plant garden at Bidhannagar
College campus*

- *Assorted Nature-Study Programme for children with cerebral palsy*

The WBPCB conducted this programme in association with the Birla Industrial & Technological Museum (BITM) and the Indian Institute of Cerebral Palsy (IICP). 80 participants attended the programme that was held at the IICP Campus on January 28, 2005.

The programme began with a welcome song by students of the Centre for Special Education, IICP. The programme entailed prize distribution for the participants of the similar events held last year, short skit by the students of the Centre for Special Education, IICP, and a tour of an ongoing exhibition. The main components of the programme comprised of the following contests:

- “Sense the smell of nature” for students;
- Tactile game titled “Touch and Find”;
- Painting Competition and
- Quiz on nature and environment.

- *Environmental awareness programme for the visually challenged children*

In collaboration with the BITM, 110 visually challenged children from three schools, namely, Lighthouse for the Blind, Blind Boy’s Academy (Narendrapur) and Calcutta Blind School (Behala) participated in this environmental awareness event. The programme held at the BITM campus on March 18, 2005 included the following unique features:

- Workshop on “How to identify birds with their calls only” entailing presentation of real-life experience by Shri Arup Chakraborty, an adept blind birdwatcher at the Technology Centre, BITM;
- Competitive events, such as:
 - Clay Modeling for students of classes V & below, at the Robot Room, BITM



Visually challenged students participating at an awareness programme

- A tactile game titled ‘Touch & Find’ for students of classes VI & VII at the Portico of Technology Centre, BITM

- “Sense the smell of nature” for students of classes VIII to X at the Portico of Technology Centre, BITM;
- Valediction and prize distribution at the Technology Centre, BITM
- Visits to the museum galleries of the BITM.

c) Quieting Noise Pollution in West Bengal

Schoolchildren played a significant role in the noise control campaign programme of the Board. Eco-club student members belonging to the National Green Corps (a Government-of-India programme aimed to spread environmental awareness among school children) participated in various awareness programmes. By means of rallies and demonstrations, the students facilitated the process of the noise-related legal directions to reach the masses. Various seminars/talks/debates were organised to inform the student members of the eco-clubs on issues related to exposure to noise pollution, the state of the problem and further actions that could be undertaken by them to minimise or eliminate such problem.

● **Training Programmes on noise pollution organised by the WBPCB**

A total of 159 participants including the officials of the West Bengal Police, Kolkata Police and Motor Vehicles Inspectors attended training programmes on noise pollution. These training-cum-Awareness Programmes on Environment included features like lectures, audio-visual shows and technical sessions.

d) Forest and Wildlife

Nature trails and green scout camps enable the children to know about nature and understand the need of its conservation. To enable children belonging to all strata of the society to grasp the green basics, various events were organised under the WBPCB Environmental Campaign. The purpose of these programmes was to promote an awareness of our natural environment. As indicated below, the brief account illustrates the programmes conducted under the WBPCB Environmental Campaign during the time period in question.

● *Nature trail at Science City*

In collaboration with the Birla Industrial Technological Museum, a nature trail was organized in Science City on November 19, 2004 for school students. Dr. Sudip K. Bandyopadhyay (Chairman, WBPCB) and Dr. T.K. Ganguly (Director, Science City) were among the dignitaries present in the inauguration programme.



Students identifying faunal species at a nature trail programme at Science City

● *Green Scout Camp for students of North 24 Parganas*

A Green Scout Camp was organised at Salt Lake Stadium for the students of the district of North 24 Parganas on June 2 to 6, 2005. About 180 students from schools of North 24 Parganas joined the camp, which was organised in association with WWF-India.

● *Nature trails for children in collaboration with TERI*

The Energy and Resources Institute (TERI), an NGO Component of the Kolkata Environment Improvement Project (KEIP) was a key collaborator of the WBPCB Environmental Campaign. Various nature trails were organised under the theme 'Forest & Wildlife'. These creative communication events were in connection with its awareness-generation and community development programs that institutionalises the worldview of "learning from one another". Children belonging to different wards of Kolkata Municipal Corporation participated in these nature trails. The purpose was unique. The slum children, the target group of this programme did not live in the best of conditions and could reach out to little or no education facilities. The idea of environmental protection was new to these children. The event basically aimed at making the children aware of the importance of environmental protection that would automatically be conveyed to their families and kinfolk. Apart from creating community awareness, the event served to facilitate social upliftment and its development.

e) Learning about our Environment

Environmental learning experiences can provide an awareness of who we are and how we relate to the world around us. Studying and exploring the environment teaches our children to care for the earth's natural resources while fostering a sense of respect for living things. Outdoor learning experiences excite the students and can open doors to scientific discovery that will remain open forever. The activities of the

theme “Environmental Studies” conducted under the WBPCB Environmental Campaign thus encourage and educate both teachers and students about the importance of conserving and protecting our natural resources.

- *Debate for college students on “Development Vs Environment”*

In collaboration with the World Wildlife Fund for Nature - India (WWF-India), a debate competition for college students on “Development vs Environment” was held at Ballygunge Science College, Kolkata. Held on March 1, 2004, about 24 students attended in the programme. The National University of Juridical Sciences bagged the first prize.

- *Training Programmes for the WBPCB Registered NGOs*

The West Bengal Pollution Control Board (WBPCB) has engaged more than 150 non-government organisations (NGOs) to work on protecting the environment of the state. Chosen on the basis of an analysis of their ability to save the environment, these NGOs, located throughout the state, shoulder the responsibility of communicating the Board’s mandates to people far and wide. The NGOs facilitate addressing current environmental concerns, such as restriction on the use of plastic carry bags, controlling noise pollution, wetland conservation etc.

- *Workshops on ‘Physics and Environment’*

During May 26 to 30, 2004, a workshop on ‘Physics & Environment’ was organised in association with Jagadis Bose National Science Talent Search (JBNSTS). Held at Howrah Jogesh Chandra Girls’ High School, about 60 Students of Classes VII & VIII of schools in Howrah participated in the workshop. Another JBNSTS-collaborated workshop on the same subject was organised during October 14 to 17, 2004 at Kamalpur Netaji High School, Bankura. About 31 children (of the age-group 12-14 years) of

four schools of Bankura district participated in the workshop.

- *Workshop titled ‘Vacation Classes’*

In association with JBNSTS, another workshop titled ‘Vacation Classes’ was organised during May 30 to June 11, 2004 at Ramakrishna Mission Residential College, Narendrapur. About 55 Students of classes XI & XII of schools in Darjeeling, Jalpaiguri, Cooch Behar and Kolkata attended the workshop. The workshop highlighted on themes, such as ‘Urban Area and Environment’, ‘Atmospheric Science’, ‘Our Feathered Friends’ and ‘Joint Forest Management’.

- *Teachers’ Training Workshop at Jalpaiguri*

In association with the World Wildlife Fund for Nature-India (WWF-India), a Teachers’ Training Workshop was held at Gorumara Jungle Camp, Jalpaiguri during June 12 to 13, 2004. The theme of the workshop was ‘Medicinal Plants’. Dr. Dulal Pal, Retired Scientist, Botanical Survey of India was the resource person for the workshop. About 24 teachers from 11 schools attended the programme. Beside the teachers, members of local NGOs participated at the workshop.



Teachers’ training workshop on Medicinal Plants

- *Workshop on ‘Medicinal Plants and Rain Water Harvesting’*

A similar workshop titled ‘Medicinal Plants & Rainwater Harvesting’ was organised in association with WWF-India during June 14-

15, 2004 at Gymkhana Club, Darjeeling. About 35 teachers and students from 11 schools including two NGO-members participated at the workshop.



Teachers' training workshop on Water Conservation

● *Workshop on Plantation*

July is the season for plantation. The WBPCB, in association with WWF-India organised a workshop on plantation, emphasising on medicinal plants, at Kalinagar, Purba Midnapore. About 85 students and teachers from 15 participating schools of the district participated in the workshop that was held on July 16, 2004.

● *Teachers' Training Workshop at Kolkata*

In the month of August, a Teachers' Training Workshop was held on August 17-18, 2004 at Bible Society for the teachers of the schools of Kolkata. The theme of the workshop organised in collaboration with WWF-India was 'Water (Pollution & Conservation) and Rainwater Harvesting in Schools'. A total of 34 teachers from 15 schools participated in the workshop.

● *Workshop on 'Environment & Mathematics'*

During September 15 to 18, 2004, a workshop on 'Environment & Mathematics' was organised in association with Jagadis Bose National Science Talent Search at Katwa Kashiram Das Institution, Katwa, Burdwan. About 60 students of schools of Burdwan district participated in the workshop.

● *Study of Mangroves*

In order to introduce students to the importance of mangrove ecosystem, a two-day nature study camp was conducted on November 3 to 4, 2004 at Sunderbans. About 60 student-members and teachers from nature clubs of 12 schools, as well as two NGO members of Purba Medinipur district attended the camp.

● *Teachers' Training Workshop at 24 Parganas (North)*

In association with WWF-India, a Teachers' Training Workshop was held for 24 Parganas (N) at Sunderban HMTA Junior High Madrasah on September 18-19, 2004. About 44 teachers from 16 madrasahs joined the workshop. The workshop was inaugurated with a plantation programme of ten saplings in front of school premises. The teachers were introduced to Environmental Education in the school curriculum.

● *Teachers' Training Workshop at Coochbehar*

A WWF-India collaborative workshop on medicinal plants was held during November 8-9, 2004 at Coochbehar. The teachers of the schools of Coochbehar district were very eager to learn about the uses of medicinal plants and also wanted to identify different types of local medicinal plants. Dr. Dulal Pal, Ex-scientist, Botanical Survey of India was the resource person for the workshop. About 20 teachers from 11 schools attended the programme.

● *Bird Watching Programmes*

Bird watching programmes are important for small children. It is not only an interesting hobby but also explains the importance of birds in maintaining the ecological balance. As described below, three bird watching trips were organised in association with WWF-India.

Rasik Beel, Coochbehar

In the morning of November 9, 2004, about 30 students and 20 teachers went to Rasik Beel, a famous wetland located in the district of Coochbehar.

Rajabhatkhawa forest, Jalpaiguri

On November 10, 2004, about 50 students and 10 teachers of six schools of Jalpaiguri district went for another bird watching trip to Rajabhatkhawa forest. After assembling at six in the morning, the participants were given some tips on bird watching. The book "Waterfowl Identification Manual" was given as field guide to the participants.

Santragachi Jheel, Kolkata

On January 17, 2005, a bird watching trip was organised for 35 students and seven teachers at Santragachi Jheel for six schools of Kolkata.



Bird watching programme for students at Santragachi Jheel

● *Teacher's Training workshop at Darjeeling and Kalimpong*

In association with the United States Asia Environment Programme (USAEP), a Teacher's Training Workshop was organised at Ramakrishna Mission B.Ed. College, Darjeeling on December 3, 2004. A total of 40 teachers from various colleges of the districts of North Bengal participated in the workshop.

● *Workshop on Soil testing at Purulia*

About 100 students and teachers from 16 schools of Pucha block of Purulia participated in a soil testing workshop held on December 29, 2004 at the Assembly Hall of Napara High School, Pucha, Purulia. The main idea of the soil testing programme was to create awareness



Workshop on Soil Pollution at Purulia

among the students about the pollution generated from the use of chemical fertilizers and pesticides in agricultural fields.

● *Workshop on Vermiculture at Purulia*

When we talk about the demerits of chemical fertilizer and pesticides, it is imperative to suggest an alternative. With this view, a workshop on vermiculture and compost making was organised in association with WWF-India on December 30, 2004 at the Assembly Hall of Napara High School, Purulia. About 100 students and teachers from 16 schools of Purulia participated in the vermiculture workshop. The resource person of the workshop was Shri Bivas Paira, a farmer of Purba Midnapore representing JS DRWS, a non-governmental organisation. Shri Paira interacted with the students and made a model plot in Napara School to demonstrate the method of preparing vermiculture pits. The book "*Kencho Palan Ebong Compost Tairir Padhati*" was given as resource material to the participants.

● *Students' Workshop on Medicinal Plants at Sunderbans*

A Workshop on Medicinal Plants, a *Padayatra* to save mangrove ecosystem and a puppet show on wildlife conservation were arranged for 1000 nature club members from 22 schools of Bali island in Sunderban on January 21, 2004. These activities were conducted in association with WWF-India.

f) Nature, Natural Resource, Environment and Society

● *Nature Fair for Kolkata Schools*

On Earth Day, an 'Earth Fest' was organised for the nature club members of Kolkata schools. Organised in association with WWF-India, the fair was held on April 21, 2005 at the premises of Future Foundation School and was inaugurated by Shri Ranjan Mitter, Principal of the school. Students from Future Foundation School, St. Lawrence School and Akshar presented small skits on different environment problems. Dr. Abhijit Mitra, Senior Lecturer, Department of Marine Science delivered a talk on climate change and its impact on marine biodiversity, which was very educative for the students. The theme of the event was 'Environment of Kolkata'.



Nature club members participating at the Earth Fest

● *Community Awareness programmes for children in collaboration with TERI*

Programmes on community awareness were organised in association with the Energy & Resources Institute (TERI), an NGO Component of the Kolkata Environment Improvement Project (KEIP). Various sit-and-draw competitions and wall painting programmes were organised under the theme 'Nature, Natural Resource, Environment & Society' of the Campaign.

Sit-and-Draw Competitions : This event not only involved local school children but also attracted their parents, to whom the scope and

objectives of the programme were explained during the prize-giving ceremony. Related issues such as community development, participatory urban development and O&M (Operant Maintenance) of physical infrastructure were also discussed during community meetings and focus group discussions with the help of static tools such as leaflets and posters.

Wall Painting : Paintings were done by professional artists on the walls of ICDS (Integrated Child Development Services) Centres, local youth clubs, primary schools, pay-and-use toilets and parks. The various themes included environmental pollution, sustainable development, ban on plastic carry bags, safe sanitation practices, health and hygiene, and solid waste management.

g) Developing Personal Hygiene and Public Health

Various awareness programmes on efficient management of biomedical waste were conducted during 2004-2005. Biomedical waste, when disposed of carelessly, doesn't go away, but finds way of getting back into our system. Putting waste in appropriate bin, according to its nature, and treating it correctly, go a long way in controlling the spread of infection, decreasing occupational hazards, reducing the amount of waste that requires treatment, saving money and ensuring compliance with law. These specifications are mentioned in the Bio-Medical Waste (Management & Handling) Rules, 1998.

Seminars on Biomedical Waste Management in Kolkata

In order to develop awareness on the safe waste handling procedure among the hospital staff, the WBPCB organised a series of seminars on safe disposal of biomedical waste management in government and private hospitals and nursing homes. These programmes were organised in collaboration with Medicare Incin Pvt. Ltd, a group company of Hyderabad-based Ramky Enviro Engineers Ltd that implements the common biomedical treatment plant at Howrah

for healthcare establishments located at Kolkata and Howrah.

The seminars started with presentations on the procedure of biomedical waste handling followed by interactive sessions with the staff members and the WBPCB. The method of

handling hospital waste as per the colour specifications was also demonstrated during the seminars. Various awareness-generating leaflets were distributed among the staff members and other officials of the hospitals, who attended the seminars with great enthusiasm.

SECTION II

MAJOR EVENTS, FAIRS & FESTIVALS

- The West Bengal Pollution Control Board celebrated the 'World Environment Day 2004' in a befitting manner. The main programme was held at the Paribesh Bhawan Auditorium, Salt Lake, Kolkata on June 5, 2004. All the Regional Offices of the Board celebrated "World Environment Day" with the help of local NGOs and other organisations. The World Environment Day theme selected by the United Nations Environment Programme for 2004 is "Wanted! Seas and Oceans - Dead or Alive?" The theme called for a choice as to how we want to treat the seas and oceans of our planet.



At the main function held at Paribesh Bhaban, Shri Buddhadeb Bhattacharjee, Hon'ble Chief Minister of West Bengal graced the occasion as the Chief Guest. Shri Manabendra Mukherjee Hon'ble Minister-in-charge, Deptts. of Information Technology & Environment, Government of West Bengal, presided over the function. In addition, invitees from industries, non-governmental

organisations and other institutions participated in the programme. The Hon'ble Chief Minister released two books and also launched a CD on the ambient air quality data of West Bengal. An electromagnetic board for display of relevant information was also inaugurated on the same day, which is displayed at Esplanade, Kolkata.

On the same day, a sit-and-draw competition and a quiz competition were organised in association with Pashim Banga Vigyan Mancha at the Yuba Bharati Krirangan (Salt Lake Stadium). The events were organised exclusively for school children and a total of about 1000 students from different parts of the state participated.

- The Board participated at the **Sukanto Mela**, organised by Runner which was held on and from October 2 to 17, 2004 at Phoolbagan, Kolkata. In order to enhance environmental awareness, the Board displayed various information related to environment protection and pollution control in the state.
- Like every year, the Board participated at the **18th Industrial India Trade Fair** held at Kolkata Maidan (near Park Street) on and from December 20 to 31, 2004. An area of 750 sq.ft. was allotted for Board's stall in the West Bengal pavilion. The WBPCB stall was arrayed with various informative display boards, alternative

fuel kits, collection of newspaper clippings related to environment, different machines like sound level meter, sound limiter etc. Information, especially daily ambient air quality monitoring data of Kolkata was also made available through the internet at the WBPCB stall (arrangements for a computer with internet connection and projection system was made).

- The State Board sanctioned a sum of Rs.15,000/- as financial assistance for organising “**Vigyan Swasthya-O-Paribesh Mela**” that was held at Haldia on and from December 25, 2004 to January 1, 2005. This fair was organised by Haldia Vigyan Parishad, an registered NGO of the Board in collaboration with Paschim Banga Vigyan Mancha, Purba Medinipur District Committee.
- The Board also participated at the **KTPP Fair-cum-Exhibition, 2005** that was held at Kolaghat, Purba Medinipur from January 2 to 10, 2005. This event was organised under the aegis of Kolaghat Thermal Power Station Recreation Club. The Board displayed various relevant information for generating environmental awareness among rural population in West Bengal.
- The Board erected a well-decorated stall at the “**Acharya Satyendranath Basu Smarak Bijnan-O-Prajukti Mela**” that was organised at Hedua, Kolkata on and from January 19 to 23, 2005. The various activities of the Board related environmental protection was displayed at the fair.
- The Board organised various **workshops and meetings** on a regular basis with the registered NGOs working at different district of West Bengal. These events were held at the head office and different regional offices to disseminate Board’s orders, environmental news and to discuss the campaign process on various issues,

such as noise pollution, problems of plastic waste, efficient waste management and many others.

PARIBESH MELA 2005

The Board organised “**Paribesh Mela**” at the Science City, Kolkata during February 16 to 19, 2005 in collaboration with the Bengal National Chamber of Commerce & Industry and in association with Nodal Research Center and Paschim Banga Vigyan Mancha. The theme of the fair was “Towards a Sustainable Future”. The objective of the Fair was to communicate the environmental information for assisting people in understanding ways for minimising the adverse impact on the environment. Shri Manabendra Mukherjee, the Hon’ble Minister-in-Charge, Departments of Information Technology and Environment inaugurated the fair. More than 150 industry houses, industry associations, environmental laboratories and other various governmental and non-governmental organisations displayed their eco-friendly products, pollution control systems environment related books, posters etc. Besides, eminent speakers gave lectures on various environments and related issues in the seminars held at the Mini Auditorium of the Science City, Kolkata. Thousands of students, environmental activists, NGOs, academicians, researchers and general public visited the fair regularly.



The Hon’ble Minister releases a book on the occasion

On the occasion, the Hon’ble Minister released two WBPCB publications, namely ‘Air Quality

of Kolkata – Improvement through effective policy intervention’ and ‘Paribesh Mela Guide Book’.

Further, in order to aid the Tsunami-hit people of our country, two cheques, one of Rs ten lakhs, on behalf of the WBPCB and another of Rs 10,581, on behalf of the employees of the Board, were handed over to the Hon’ble Minister during the programme. The money went to the Chief Minister’s Relief Fund for helping the people affected by the disaster.

Exhibitors’ Profile

The main features of the Fair included displays of pollution control facilities, environment-related products, eco-friendly devices, pollution control equipment, laboratory facilities, model displays as well as environment-related posters and books. In addition, the event helped promote environmental awareness by way of organising different seminars and cultural programmes related to environmental issues.

More than 100 organisations including government departments, industries, public sector organisations, schools and colleges, research bodies, pollution control equipment manufacturing companies, pollution testing laboratories, environment management organisations, municipalities who have achieved excellence in solid waste handling, NGOs and others, participated at the Fair. An estimated 1000 people sojourned the fair everyday, and were either found visiting the stalls for some useful environmental information, or catching up with a seminar from one of many knowledgeable speakers, or attending some cultural performance.

The WBPCB Theme Pavilion at the Fair was a major crowdpuller. It had colourful displays concerning the Board’s activities, useful do’s and don’ts with regard to the current environmental scenario, and also presented conceptual information on sustainable development. Visitors bought the Board’s publications and collected free brochures/leaflets to be kept as useful references for the future. Various methods of environmental monitoring were demonstrated



The WBPCB Theme Pavilion at “Paribesh Mela”

at the WBPCB Pavilion, and visitors also got answers to queries related to core technical issues.

Cultural Platform: ‘Prokriti Amader’

This cultural platform, a part of Paribesh Mela, entailed songs, music, instrumentals and dance performances on environment by eminent artists, as well as by children of different age groups who were interested to perform on the occasion. Bengali contemporary popular music bands featuring *Chandrabindee* and *Arka*, and musical groups like *Anantya* and *Gangghil* also performed. Various plays related to environment were staged, such as the one titled ‘*Aronner Kanna*’ by Gramya Hitkari Girls’ School and another by Pashchim Banga Vigyan Mancha. A puppet show by *Shailpik* parodying the concept of environmental protection was popular with the crowd.

Free PUC check-up at Paribesh Mela

On the occasion of Paribesh Mela 2005, there was a provision for free vehicular emission check-up at Parama Island, located near the fair premises. This free PUC (Pollution-Under-Check) certification camp was jointly organised by the State Department of Transport, West Bengal Pollution Control Board, Society for Indian Automobile Manufacturers and Auto Emission Testers’ Association. Out of a hundred petrol-driven vehicles tested, 74 per cent were found to have passed the test. In addition, out of the 16 diesel-driven four-wheelers that underwent the check-up, as many as 13 vehicles passed the tests.

SECTION III

NATIONAL GREEN CORPS PROGRAMME IN WEST BENGAL

The Ministry of Environment and Forests, Government of India had launched a 'National Green Corps' (NGC) scheme in schools all over the country to spread environmental awareness and carry out action based programmes for the protection and improvement of the environment. The NGC programme aims to provide opportunities for children to understand the environment and environmental problems, through school eco-clubs.

In order to coordinate the implementation of the NGC programme in West Bengal, a State Steering Committee was constituted. There is another committee in each district i.e. District Implementation and Monitoring Committee (DIMC) headed by the District Magistrate to oversee the implementation of the programme at the district level.

The WBPCB is the State Nodal Agency for the implementation and Paschim Banga Vigyan Mancha is the State Implementing Agency of this programme in our state. As tabulated, under the NGC programme, at present there are 2850 schools covering 19 districts of West Bengal (including Kolkata).

Different programmes are undertaken by the eco-clubs of the State NGC schools throughout the year :

Seminars/talks/debates: The objectives of the seminars/talks/debates is to inform the student members of the eco-clubs on issues related to exposure to various kinds of environmental pollution, the state of the problem and further actions that could be undertaken by them to minimise (or eliminate) such problem.

Nature camp/Field Visit: The world of nature is a living kaleidoscope of all the plants and animals that live harmoniously in a perfectly balanced system. It is imperative for the young children to understand how nature works before learning the ways to conserve and care for it.

During the nature camps and field visits, the student members of the eco-clubs are given worksheets that they have to work on. The worksheet has various aspects related to flora and fauna of the area. These programmes provide the young minds with an excellent opportunity to grow, by way of observing the relationships between plants and animals.

Plantation programmes: Plantation programme for school children is an important investment in environmental education. Planting trees by children is a campaign aimed to develop interest of children to save our environment. It encourages to fight against rapid loss of greenery, by the small tender hands of future planners of the earth.

Cleanliness Drive: With a vision that "Cleanliness begins in schools", the schoolchildren are involved in activities, such as cleaning their school premises, before starting to make efforts for a cleaner world.

Awareness by rallies: The student members of the eco-clubs participate in rallies to make the people in their locality aware of various environmental issues, such as plastic pollution, noise pollution, observation of important days related to environment etc.

Survey: Intensive nature survey works conducted by school children enable them to recognise the intricate problems and devise strategies to eliminate them. For instance, student members of the eco-clubs doing a survey of a nearby wetland would be able to identify the problem and help solve a local environmental problem easily.

Other activities: The other key activities undertaken by the individual schools and District Committee are eco-meets, planting medicinal plant garden, observation of important days related to environment, such as World

TABLE 2.9.3
NGC SCHOOLS OF WEST BENGAL

Sl. No.	Name of the District	Renewed No. of Eco-clubs	No. of New Eco-clubs	Total No. of Eco-clubs
1.	Bankura	136	70	206
2.	Birbhum	87	75	162
3.	Burdwan	112	90	202
4.	Cooch Behar	100	18	118
5.	Dakshin Dinajpur	80	51	131
6.	Darjeeling	93	46	139
7.	Hooghly	97	55	152
8.	Howrah	100	63	163
9.	Jalpaiguri	92	18	110
10.	Kolkata	118	83	201
11.	Malda	75	37	112
12.	Mushidabad	102	52	154
13.	Nadia	69	27	96
14.	North 24 Parganas	102	100	202
15.	Pashchim Medinipur	101	65	166
16.	Purba Medinipur	77	99	176
17.	Purulia	100	-	100
18.	South 24 Parganas	94	77	171
19.	Uttar Dinajpur	82	07	89
	Total	1817	1033	2850

Environment Day, World Wetlands Day, National Science Day, Forest Week, etc.

The eco-club student members participate in various awareness programmes that are conducted under the theme 'Nature, Natural Resource, Environment & Society' of the WBPCB Environmental Campaign. One event that deserves special mention was a street demonstration by the NGC students of Siliguri on December 4, 2004. The eco-club student members staged placard demonstration on different environmental issues at Tenzing Norgye Bus Stand, Siliguri

on that day. People amassed in huge numbers to gather the message that the students wanted to convey.

Nature Study Camps for schoolchildren

The Board organised two nature study camps at Ayodhya Hills (Purulia) and Sukna (Mahananda Wildlife Sanctuary) in 2004-2005. These camps were designed for young children to create an understanding about our natural environment and to cultivate a protective attitude towards it.



Eco-club student members at the Purulia Nature Study Camp

The activities at the camps were a blend of adventure, skill training, nature study work, field surveys and outdoor experience under the leadership of experienced wilderness guides.

Under the theme “Nature, Natural Resource, Environment and Society” of the WBPCB Environmental Campaign, these nature camps were conducted as awareness programmes for the student members of classes V to XII of the eco-clubs of the schools belonging to the National Green Corps programme. The student members of the various eco-clubs of the state participated in several individual and group events, which were implemented within stipulated deadlines. The individual events included Sit-and-Draw Competition, Making Posters with a Slogan, Essay Writing Competition and Project Preparation and group events included Nature Quest, Medicinal Plant Garden, Biodiversity, Eco-club Diary, etc.

The district-level toppers of the individual events, and, the candidates securing the first, second and third positions for the individual events and the students belonging to the top group (for the group events) at the state level participated in the nature camps. The Purulia and Sukna camps were organised for the toppers of the events held in 2003-2004. The nature camps, coming as a reward for the winners of

these events, were aimed to deepen the children’s sense of wonder, and to inculcate a sense of environmental responsibility among them. These camps were a perfect platform for the students to experience the marvels and intricacies of the natural world through focused, innovative and meaningful nature study activities.

The first nature camp was held at Ayodhya Hill, Purulia on and from January 22 to January 25, 2004. A total of 50 students from 13 South Bengal districts participated in the camp. The Hon’ble Minister-in-charge, Departments of Information Technology & Environment, Government of West Bengal, Shri Manabendra Mukherjee inaugurated the nature camp at the Ayodhya Range Office Campus on January 23, 2004. Birla Industrial Technological Museum and Paschimbanga Vigyan Mancha were the key collaborators of the programme.



Students exploring nature at the Sukna Nature Study Camp

The second camp was held at Sukna Campus of Wildlife Division-I on and from June 6 to June 8, 2004. The Camp was inaugurated at Sukna Campus of Wildlife Division-I of Mahananda Wildlife Sanctuary, Department of Forest, Government of West Bengal, on June 6, 2004. About 36 students and 10 teachers-in-charge from six northern districts of West Bengal participated in the Sukna camp.