

10. Mean Temperature and Rainfall:

The altitude of Peshawar is 352 meters from Mean Sea Level (MSL). The mean maximum and mean minimum temperature of Peshawar are 31°C and 16°C respectively. The monthly mean rainfall in Peshawar is 40 millimeter (mm).

3- IMPLEMENTATION OF PAK-EPA AND NWFP-EPA

3.1 Organization on this study

Figure-1 shows the organization chart of this study. This study was carried out with total management and overall Planning by Pak-EPA. Pak-EPA with collaboration of NWFP-EPA conducted survey on urbanization, water environment, solid waste management and topographic survey of dumping site to find out the total dumped volume of the solid waste.

Japanese Ministry of Environment asked OECC to dispatch the study team to Pakistan to examine the Japan's assistance to Pakistan for its environment and sustainable development in the early 21st century.

Six members OECC study mission headed by Katsuhiko YAMAMOTO and Hironori KUROKI Visited Pakistan w.e.f. October 6, 2003 to October 19, 2003 to hold meetings with Pakistan Ministry of Environment, Director General Pak-EPA and Other related agencies/organizations. They also visited the study area (Hayatabad, Peshawar) and physically examined the environmental related problems over there and hold meetings with civic agencies, institutions and NWFP government officials. A memorandum of agreement was signed between head of OECC mission and Director General, Pak-EPA to research on the field survey for urban environmental problems in Pakistan (A case study of water environment in Hayatabad, Peshawar).

3-2 Location of the Study Area

i) Project Offices:

Main at Pak-EPA, coordination with NWFP-EPA in conducting the survey on water pollution, solid waste management and topographic survey of solid waste dumping site.

ii) Study Area Location:

Hayatabad township is situated approximately 15 Km south-west of the main center. The scheme is spread over an area of more than three thousands acres of land containing 22503 residential and about 300 commercial plots.

3-3 Scope of the Study

The survey executed on the following categories in Hayatabad as a model area in Peshawar city.

1- Urbanization

- 2- Water condition (volume and quality)
To collect the water samples from the pre-selected points (Leachate, Point-1 to Point-7) and analyzed for pre-determined parameters.
- 3- Hydro-geological characteristics
To collect the data on geomorphic surface and borehole logs on several tube wells in Peshawar
- 4- Current-water use
To investigate the water demand from the usage, distribution system of city water and well points.
- 5- Solid Waste Management
 - To investigate the volume and quality of solid waste through the process of collection, transportation and disposal
 - Topographic survey of dumping site to find out the dumped volume over the years.
 - Recycle route and value.

3-4 Terms of Study

Pak-EPA to complete the investigation, compile a report and submit it to OECC.

3-5 Others

Any dispute related to the implementation of this survey will be settled amicably between OECC and Pak-EPA.

4- IMPLEMENTED SCHEDULE.

Table-3 shows the time schedule on this investigation. Actual implementation plan was little delayed due to pressing engagements of Pak-EPA Officers in Islamabad due to SARC Summit and visit of foreign delegation at Pak-EPA.

OECC study team visited Pakistan from October 5th, 2003 to October 8th, 2003 to conduct the preliminary study on urban environment especially the case study area, Peshawar and had meetings with different government departments to know the actual environmental problems in Pakistan.

Pak-EPA Officers comprising Mr. Zia-Ul-Islam, Director, EIA/Monitoring and Mr. Ahsan Rafi Kiani, Deputy Director along with Dr. Zulfiqar H. Lodhi, Chief Chemist/JICA study conducted the pre-investigation visit to Peshawar w.e.f December 8th, 2003. They visited the study area and chalked out the actual study implementation program. During their stay in Peshawar, they have detailed meetings with the then Director General, NWFP-EPA about their role in this study and cooperation in data collection and survey on Solid waste management. Pre-investigation team also held meetings with the Chairman, Department of Environmental Sciences, University of Peshawar and Officials of City Development and Municipal Department (CD & MD) about their cooperation and participation in this study.