

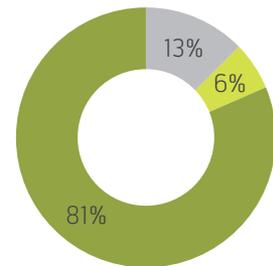
# CLIMATE CHANGE—PROMOTING GREEN FOR A SUSTAINABLE LIFESTYLE

The ICT industry has an increasingly important role in working towards the prevention of global warming due to the emission of hazardous greenhouse gases. Towards 2020, the telecom industry will experience continued growth both in energy usage and CO<sub>2</sub> footprint as more people worldwide enter the digital age and more customers demand increased mobile broadband services. Energy use in GP’s network operations represent around 81% of our total energy consumption and is the main source for our CO<sub>2</sub> emissions.

Grameenphone (GP) continually strives to reduce the environment and climate impact of its operations and services and inspires employees and all its stakeholders to act responsibly. This is why the Climate Change Program was initiated by GP in 2008, with the objective of minimizing the negative environmental impact on the community. At the same time, GP adopted EMS (Environmental Management Systems) approach that laid out the policy framework to look for sustainable operations.

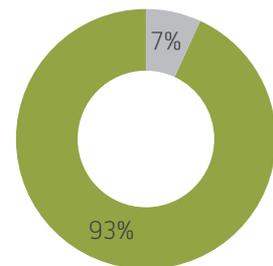
As a part of continuous efforts, GP has taken a number of initiatives like introduction of green base stations, swapping of air conditioners with DC ventilation fans, and modernization of entire network which helped reduce carbon footprint significantly over the years. Built in 2010, as part of awareness and adoption, the corporate headquarter, GPHouse, has also become a magnificent model of true green architecture in the country. Mobicash and Billpay have been instrumental in reducing customers’ travel requirement and hence contributed to minimizing carbon emission of the society. As a result of such sustainable operational activities, GP has been both locally and globally recognized and rewarded on different occasions; the latest one being the winner of the prestigious GSMA Green Mobile Award 2014.

Use of Energy



■ Networks ■ Transport ■ Office

Energy Source Distribution for Networks



■ National Grid ■ Solar



## Top Green Initiatives of 2014:

### A. Carbon Dioxide (CO<sub>2</sub>) Emission Reduction

#### Aggressive rollout of solar powered base stations

Being a socially responsible company, as part of its continuous network expansion in the deep rural areas where

power availability is a concern, GP is always exploring renewable energy solution. As of 2014, a total of 656 base station sites are running on solar power. The Company has an



ambition of rolling out this solution more aggressively in the coming years. Around 40% of network expansion of 2015 has been designed with solar power. These solar powered base station sites will be saving around 4 Million liters of fossil fuel and more than 10 thousand tons of CO<sub>2</sub> emission annually.

### Modernization of transmission network and core site consolidation

In the context of network modernization, in the year 2014, GP has swapped its IP transmission backbone network. These modern equipments consume less than 15% energy compared to previous ones which is saving 176 tons of CO<sub>2</sub> emission annually. Moreover, as a part of continuous network modernization and introduction of higher capacity switching equipments with less footprints, GP has been consolidating its switch locations and hence, in 2014, three more core locations were vacated. The result was a savings of 650 MWhr electricity and 10,500 Liters fuel which is saving 420 tons of CO<sub>2</sub> emission.

### Introduction of bio-generator

In continuation of introducing innovative power generation solutions, GP in partnership with a local partner, has set up a generator which runs on biogas produced from poultry litters. This set up is supplying more than 1 KW of power for our base station in parallel to supplying power to nearby few small shops. Based on the success, similar solutions can be rolled out to other suitable locations.

## B. Environment Friendly Operation

### Electronic waste management

Being an environment friendly company, GP manages its obsolete electronic wastes following the international policy and fully complying with laws of the country. After recycling

the huge BTS and core cabinets in the previous years, GP is now recycling its obsolete GSM and microwave antennas and other electronic accessories engaging globally renowned vendors. As part of this recycling process, all hardware except the circuit boards will be recycled to recover the constituent iron, aluminum, stainless steel, copper, and plastic for reuse. The circuit boards will be drilled and exported to vendor facility to recycle through electronic waste treatment. The recycling work will be performed both in Bangladesh and abroad according to ISO 14000, OSHAS 18000 and R2 Standards.

## C. Awareness & Engagement

### Click Green photography contest

GP always encourages and promotes various employee awareness and engagement programs to enable the employees to make a difference. One such initiative is "Click Green" a photography competition which is regularly being arranged since 2009 for the employees of GP to create environmental awareness. In 2014, for the first time, it was open for all GP Facebook Page fans and GP Instagram Account followers. The aim of this competition is to encourage our fans and followers to think, reflect and act towards the commitment of being environment friendly and also to inspire and promote 'Green Lifestyle'.

### Cycling awareness for the GP employees

Another major employee awareness session was arranged in November 2014 to promote and inspire cycling for GP employees. Cycling for a healthy life and greener environment was the main focus of the event. Arranging cycle fair, demonstration of safe cycle riding, safety tool distribution etc. were some major activities of the session.

