

# Proposing an Environment Friendly Campus



## UNIVERSITY PROJECT – PROPOSING AN ENVIRONMENT FRIENDLY CAMPUS

### *Introduction*

Habib University Foundation is initiating the establishment of a world-class research-based university to cultivate a culture of knowledge generation and application. The University will be established within the precincts of the Education City of Karachi, and will be fully equipped with the latest technologies and resources. It will support government initiatives to strengthen Higher Education in Pakistan, and will intensively focus on promoting the ethical use of new and advanced technologies, whilst keeping in consideration the local context and value for indigenous knowledge and wisdom. The University encapsulates our vision towards developing a quality higher education space within the country.

The University will have strong partnerships with national, regional and international universities and relevant research institutes. It will enter into various forms of agreements with business and industry to promote a culture of collaborative research, planning and implementation. The University will encourage students to engage in community based programs to increase the relevance of the offered courses and to enable them to understand and resolve real life issues.

### *Making an Environment Friendly Campus*

Habib University Foundation strongly believes that environmentally responsible practice and education go hand in hand and environmentally responsible tenets must be borne out by example. The Foundation is committed towards protecting the environment and will ensure environment sustainability on its University campus. The Foundation is striving to build it as a model environmental community where operational functions, business practices, academic programs, and people are interlinked, providing educational and practical value to the institution, the region, and the world.

Our world today faces enormous challenges presented by issues such as environmental deterioration, energy crises and water shortage. Leading universities around the world are initiating programs to ensure environmental sustainability and discover ways to conserve consumption of environmental resources. The green campus concept offers Habib University Foundation the opportunity to take the lead in rethinking the University's environmental culture and developing new paradigms for solving problems that are local, national, and global in nature.

To ensure that the University is a green campus, policies will be implemented to minimize wasteful inefficiencies. Daily, practical aspects of campus life such as correct disposal, handling, and storage of cleaning chemicals and materials associated with labs and automotive shops; purchase of environmentally friendly supplies; effective recycling

The Habib University Foundation is establishing a University in the Education City of Karachi.

To ensure environmental sustainability, the University will implement environment friendly policies and programs.

Due to challenges posed by increasing environmental deterioration....

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programs, energy conservation; limited water consumption etc. will be addressed through these policies.

### ***Campus Programs***

As a green campus institute, the University will conduct its activities according to a system-wide culture of environmental sustainability, balancing function and design with existing and foreseen resources. Furthermore, it will be a laboratory of self scrutiny, experimentation, and application.

The University planning team is conducting a thorough research to develop administrative and operational functions from the standpoints of human health and the environment. Some of the areas of interest for the University campus are listed below:

**Buildings:** The University will be built on the principles of sustainable design and energy management. All the structures on the campus will be designed, built, renovated, operated, and reused in an ecological and resource-efficient manner.

**Recycling and waste management:** The University will use recycling methods, waste diversion, and reuse programs to promote efforts to decrease the amount of landfill waste, and use efficient solid and hazardous waste management.

**Carbon neutrality:** The University will devise innovative mechanisms to minimize global warming emissions in order to fight the threat of global warming. Also, knowledge and education will be provided to students on how to achieve climate neutrality.

**Water use:** Innovative water management policies and research will be conducted by the University to minimize water consumption, store and utilize storm water and recycle water.

**Energy:** The University Planning team will explore energy policies, energy conservation strategies and alternative energy resources for development of sustainable energy sources.

**Transportation:** The University will focus on alternative fuels, fuel efficiency, carpooling and vanpooling for students and faculty members to enable sustainable transportation.

### ***Benefits of an Environment Friendly Campus***

Greening initiatives are challenging and require determination and a long-term commitment on the part of the entire campus community. While a green building may

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.... and develop alternative fuels and fuel efficiency.

cost more up front, it saves through lower operating costs over the life of the building. Significant paybacks include the following:

**Environmental and economic sustainability:** A system-wide culture of sustainability helps preserve the environment. Sustainable green structures will incorporate natural lighting, improve air quality and reduce energy and water use, yielding significant economic benefits through efficient use of water, energy and other environmental resources.

**Reputation as a leader through example:** As mentioned above, the University must lead environmental sustainability practices by example. Many colleges and universities fall far short of making their mark as environmental leaders, because they fail to practice on the campus what they preach in the classroom. The University will not only offer courses in environmental management, but will also comply with environmental requirements and actively participate in conducting environmental research.

**Economic benefits:** A routine, curriculum-based, environmental audit program will reveal waste and inefficiency associated with campus activities and identification of environmentally friendly alternatives will yield significant cost savings for our institution.

**Improved quality of life on our campus:** A green campus is a cleaner, safer, and healthier place to live and work.

**“Real-life” work experience for our students:** Environmental audits and pollution prevention evaluations can be integrated into the curriculum, providing students with hands-on investigative and problem-solving experience that they can take with them when they enter the workforce. This experience will not only enable our students to think out of the box, but will also make them conscious about their environmental imprint and encourage them to pursue environmental friendly approaches at their work place.

**The student ingredient:** Through an exciting new curriculum that encourages students to take the lead in creating a positive change, the University will combine theory with practice. Furthermore, students who hope to work in the environmental field will be the key ingredients for a successful program.

### **Support Required**

Improvements made in any of the areas mentioned above will serve as important lessons in environmental accountability and responsibility. While some improvements involve solutions that are more obvious and practical, some are required by regulation, and others call for out-and-out ingenuity. The Foundation is excited about the prospect of contributing to environmental sustainability through its University and looks forward

Benefits of building environmentally sustainable campus extend from environmental and economic sustainability...

... to building a reputation as a leading University in environmental management, ...

... various economic benefits due to efficient use of resources, ...

... a cleaner, safer, healthier place to live and work in, ...

... practical learning experience for University students, ...

... possibilities for students to take the lead in creating a positive change ...

to working in collaboration with like-minded people and organizations. The following support will be required by the Foundation in order to construct a green University.

### **Technical Support**

Interested organizations may also offer their technical expertise for the establishment of a green campus. Some areas for which the Foundation is seeking technical support include the following:

- Designing and constructing a sustainable University site
- Exploring alternative energy sources
- Water conservation, purification and management
- Reducing gaseous emissions

### **Financial Support**

Interested organizations can support the University establishment process by providing financial support to the Foundation. Some potential areas for funding are listed below:

- Construction of the University campus including research labs, library, IT Labs, residential area
- Hiring faculty, researchers, and staff in areas of environmental engineering
- Fund research on alternative energy resources
- Fund research on green campuses
- Fund trainings for University Project Team for constructing sustainable buildings

The list of areas for which support is required is not exhaustive and your suggestions for partnerships are welcome. We look forward to collaborating with interested people and organizations.

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The Foundation looks forward to collaborating with other like-minded individuals and organizations for technical support...

... and financial support....