

# **Ten Components of a Global Rapid Response Project derived from the Global Open Source Initiative Proposal<sup>1</sup>**

<sup>1</sup> The Global Open Source Initiative proposal can be downloaded from  
[http://sandrewsjr.net/gosi/proposal/GOSI\\_Proposal.pdf](http://sandrewsjr.net/gosi/proposal/GOSI_Proposal.pdf) .

## **Non-Partisan**

A global rapid response project must be non-partisan in all aspects.

### Explanation

Every partner whether academic, corporate or governmental must be able to view itself as an equal partner to any other. The origins of the research community are far less important than the cooperation that leads to discovery. Specifically, the United States Government must lead by participating as an equal partner. The one concession will be to build the Initiative's headquarters at a neutral location within the continental United States. This concession should guarantee full commitment from the world's leading economy and contributor of greenhouse gases.

## **Cross Pollination**

To realize any expectation of producing workable solutions to Climate Change or any large scale global problem solving effort, the cross-pollination of ideas and concepts must occur on a daily basis within the project's research community.

### Explanation

The Internet has often been described as the most efficient way of connecting solution seekers. However, the best work is done face to face when body language betrays doubts, concerns and unspoken matters that can not be conveyed through a computer monitor. Given the time constraints to turn back global warming, it makes much more sense to place the investigators and leaders into one environment where a discussion over lunch could spell the difference between discovery and ignorance.

The Global Open Source Initiative's sustainable<sup>2</sup> arcology can comfortably accommodate over 7,000 researchers within a 30 acre site. This type of compact campus should maximize contact between researchers and increase the chances of the rapid response project's success.

2 Paolo Soleri, a leading advocate of sustainable architecture\development, outlined the principals of sustainable development in his treatise Arcosanti: An Urban Laboratory? (Third Edition). Mayer, AZ.: The Cosanti Press, 1993: <http://www.arcosanti.org/node/9773>

## **Symbolism**

The project should consist of recognizable symbols that the public can identify with.

### **Explanation**

The gantries and regular launches of rockets from the Kennedy Space Center during the Apollo project assured the American public that advanced technologies were being developed and the goals were achievable. The architecture of the Initiative's arcology is sufficiently unique and cutting edge<sup>3</sup> that it easily conveys the image of advanced thinking applied to desired ends. The same can be said for the Biosphere 2 facility. In essence, a rapid response project's symbols must grab and maintain the attention of the public, their representatives and the project's participants over the life of the project. In the case of Climate Change, the minimum project life will easily extend through the next decade if not for a considerably longer period of time.

The location of the Initiative is critical to its success. Arizona is currently visited by millions of U.S. and foreign tourists each year. They can easily move up the state from Tucson to the Grand Canyon. The Initiative's resources are lined up along the route and could be augmented for the public's easy access and edification.

## **Transferability and Ownership**

The project must be transferable to other locations throughout the globe.

### **Explanation**

Any effort will be significantly undermined if it is viewed as a sole government's undertaking. Ownership is key.

The small footprint of the Initiative's arcology allows it to be duplicated at various global locations which the public can visit and directly experience the enormous effort being undertaken. Duplication would assure that the rapid response project will be perceived as a global effort rather than one sponsored by a particular block of countries.

## **Required Infrastructure**

A global rapid response project will rely upon massive computing power, environmental research and cultural exchange training facilities integrated directly into or within the immediate range of the research community.

3 Soleri arcologies have been designed principally as sustainable living environments for large urban populations:  
<http://www.arcosanti.org/node/9775>

### Explanation

The same cross-pollination principal applies to this component as it does to the first. Much of the work will consist of computer modeling ecologies, economies, weather, social impacts and other complex systems. The research community must be able to work face to face with their counterparts maintaining the models in order to quickly work out system issues. The same applies to environmental testing facilities which requires a hands on approach.

The third infrastructure complex, multicultural training, is arguably the most important of the three. It is becoming increasingly apparent to large global corporations that their globally separated work groups often do not work well together due to cultural differences. One such session conducted by consultants working for a global German software corporation demonstrated that the work and social patterns of Americans, Germans and Sub-Continent Indians are completely different from each other. This can doom the prospects of a communal undertaking unless the differences are taken into account at the interpersonal level. The Global Open Source Initiative addresses the issue by including Northern Arizona University as one of its key components. Northern Arizona University has conducted ground breaking work with Native American cultures to narrow the cultural divide between themselves and the population at large. Northern Arizona University would be called on to train the Initiative's research community in techniques of working effectively together.

### **Equal Participation**

The three research providers, corporate, academic and governmental, must work as equal partners in a global rapid response project.

### Explanation

In the case of the Apollo project, the United States Government played the role of prime contractor. Immense research resources were successfully brought to bear on its behalf to accomplish the potentially unreachable goal of setting foot on the moon. Cooperation was dictated by government bureaucrats. Sovereignty was a moot issue and one of the principal reasons the Apollo project succeeded.

A global rapid response project must integrate the three research providers into a balanced and checked configuration. Issues of national, academic, or corporate sovereignty must be left behind by the researchers entering the arcology. A global undertaking of such magnitude should be viewed as an another opportunity to demonstrate that humankind can cooperate irrespective of allegiances or personal agendas.

## **Sustainable Development**

The global rapid response project must be sustainable.

### Explanation

Within the past decade, the concept of sustainable development has taken root<sup>4</sup>. The challenges of negative climate change, energy shortages, overcrowding and similar issues stem from humanity's inability to create sustainable environments. This must change if humanity expects to maintain an acceptable quality of life. A global rapid response project should represent the first large scale effort to develop a sustainable living environment which can be easily duplicated throughout the globe. The project's researchers would emerge as role models of sustainable living.

## **Open Source**

The project should rely on the Open Source development model to ensure equal sharing of credit, benefits and intellectual resources.

### Explanation

The Open Source software development model has proven a world wide success. Its principal effect has been to raise the technological bar on complex technologies. Large global software corporations such as Google, Oracle, IBM, and Redhat have contributed heretofore proprietary research to open source projects. Countries and individuals who otherwise couldn't have accessed the proprietary software are now developing and implementing new and often proprietary systems based upon the bedrock of open source contributions. The same model should be used to ensure a quick world wide adoption and integration of a rapid response project's solutions.

## **Funding**

The project should provide a mechanism which will allow at least a partial distribution of the resulting financial and technological benefits to groups unable to respond to the global challenges the project is addressing.

### Explanation

Many principalities and populations lack the means to offset the impact of challenges such as negative climate change, energy shortages and related issues. The project's researchers and leaders must take this into account and create innovative solutions to this problem.

<sup>4</sup> United Nations For Sustainable Development: <http://www.un.org/esa/sustdev/>

## **Time Frame**

A rapid response project must be put in place quickly.

## **Explanation**

A group of influential scientists has proposed that global warming can become a runaway effect within eight to ten years if nothing is done<sup>5</sup>. The project can not waste time placing its resources and preparing to work. For instance, the arcology should be completely habitable within two years of startup. For example, The Global Open Source Initiative's proposed arcology has been designed in phases. The research groups could begin occupying the early phases well in advance of the arcology's completion. As a result, the obvious benefits of cross-pollination could be experienced at the project's outset.

<sup>5</sup> See: "Warming expert: Only decade left to act in time" <http://www.msnbc.msn.com/id/14834318/>  
<http://www.guardian.co.uk/environment/2007/may/05/climatechange.climatechangeenvironment>