PROJECT EARTH: OPPORTUNITY AND RESPONSIBILITY FOR PROJECT MANAGEMENT LEADERSHIP IN A CHANGING WORLD

David L. Pells, PMP

Strategic Project Management Intl.

USA

Dallas, Texas

Chris Quaife, PMP

Symmetric Resources

CANADA

W. Vancouver, British Columbia

Catherine Tonne, PMP

Integrated Project Systems Livermore, California USA

ABSTRACT

In many countries the environment has been badly damaged by social and industrial development. At the same time development needs continue, increasing in many nations. The imbalance between developed and less developed regions adds more strain to the global environment. Opportunities for project management experts in the environmental, energy and other sectors are growing rapidly. Should project managers also take some responsibility for leadership on environmental initiatives? At the same time "Sustainable Development", the imperative to control human activity through limits of sustainability, has also become a requirement. This also presents opportunities for projects and project managers. Associations of project management professionals, such as PMI and INTERNET, are in a unique position to promote involvement by PM experts in global environmental and developmental solutions. "Project Earth" is an initiative launched by members of PMI in North America in 1991, with the support and involvement of some leaders and members of INTERNET, and now participants from many countries. It is intended to promote involvement, provide information about global environmental opportunities and projects aimed at developing areas of the world (within planetary resource limitations), promote professional project management in industry and government, and provide a network of PM experts and expertise. This paper describes the Project Earth Initiative and how PM experts around the world might participate.

INTRODUCTION: WORLD IN TRANSITION

The world is in transition, in nearly every sense. The process of change is not new, but it is now more visible in all areas of the world, and it is accelerating - in social, economic, political, military and personal activities. As more organizations adapt to change, set strategies for new or changing objectives, or become more project-oriented in their fundamental activities, project managers are in a unique position. Project managers have the knowledge and skills needed to lead and accomplish these changes. Project managers have become change managers.

1.1 BROAD TRANSFORMATIONS

The 1987 Brundtland Report, "Our Common Future", [1] was part of the inspiration for Dr. Frank King's Project Earth keynote address to the Project Management Institute's (PMI's) annual conference in 1990. The report laid out many transformations needed to achieve sustainable development. It also questioned whether our government institutions have the capability to bring these about.

Although not directly connected to the Brundtland Report, there is now widespread demand to re-invent government. A reinvention of industry, and of our material-based value systems, is now also underway in many countries. The clear imperative to bring consumption within the carrying capacity of the Earth requires an effort to match development with the planet's resources. The changes, of which few are well understood, require the full range of civilization's capability.

Will project managers accept a professional responsibility to serve the public by applying expertise in planning and achieving big picture goals - even those requiring a connection between consumption in the affluent world and population growth in the developing world? Will we apply our communication and planning capabilities to promote innovative decision-making processes (replacing confrontation and lobbying), and to abbreviate protracted financial and approval deliberations to reach "Go" decisions on badly needed projects? Or, will we merely "comply with" environmental regulations, serving fragmented goals of diverse clients, without reference to any big picture? Do professional associations, such as PMI and INTERNET, also have a social responsibility to contribute to global solutions if they have the expertise and resources to do so?

1.2 GLOBAL PERSPECTIVE FOR LOCAL INITIATIVES

As more nations, economies and societies become intertwined, more people are realizing that actions in one part of the world impact other areas and other people. As we focus on how economic or industrial activities effect our atmosphere, oceans, rivers, forests and other "global commons", this impact becomes more apparent. Examples of projects which impact other regions and people include new power plants on or near national borders, mining activities which pollute rivers crossing into other countries, waste management or incineration plants and other industrial plants which generate air or water pollution. We have learned to consider the bigger picture when we plan or initiate local or regional projects. The definition of project "stakeholders" is expanding. This is a healthy process, as it leads to more success in the long term. It requires project managers, however, to learn and apply new considerations related to the external environment, including natural, social, political and economic issues. Because project managers, however, are schooled in the "big picture", they may be in a position to lead the planning as well as the implementation of such projects.

2. HISTORY OF PROJECT EARTH INITIATIVE

The Project Earth Initiative was a response to that awareness, that project managers in fact do possess skills to plan and lead many of the global initiatives to protect or clean up the environment. Project Earth began as serious conversation among professionals and colleagues, about how volunteers with project management expertise could participate in environmental initiatives or global causes. It was not discussed or promoted as a "green" initiative, but rather to provide better direction and efficiencies to efforts already underway. Political or social issues aside, any project can benefit from the application of proven PM techniques. Many environmental and global "projects" are launched by individuals and organizations who know very little about project management, who might benefit from professional assistance. These were the ideas with which Project Earth was initiated.

2.1 STIMULUS IN CALGARY

The stimulus to really do something was provided in 1990 in Calgary, Alberta, Canada, at PMI's 1990 Seminar/Symposium. The keynote speaker at that conference was Dr. Frank King, former project manager of the Winter Olympics in Calgary and currently an executive with Cambridge Environmental Services. Dr. King dramatically painted a dismal picture of present conditions on Earth, ranging from over population and rampant diseases (like AIDS) to catastrophic pollution in many countries. Dr. King ended his presentation with a challenge to those in attendance to "do something", both as individuals and as organizations. Dr. King called for a "Project Earth", a global project to save the planet, perhaps to save Earth's citizens from themselves. [2] Following his address, a few PMI members gathered to discuss these ideas. The result was a proposal to form a volunteer group of PM professionals to launch a Project Earthtype initiative, sponsored by PMI. This was the beginning.

Of special importance was the fact that PMI'90 was held in Canada. Many of the professionals attending the conference were from Canada, Europe and countries other than the United States. When the discussions began concerning a Project Earth initiative, the idea was discussed with Mr. David Mathie, at that time the President of the Italian Project Management Association, who was also attending the PMI conference as a representative of the International Project Management Association (INTERNET) in Europe. His immediate reaction was that Project Earth should be an international initiative and should include representatives from INTERNET.

2.2 PMI'S PROJECT EARTH SIG

To provide industry focus, and an opportunity for members to meet and discuss industry-specific PM issues and methods, PMI has established a number of Specific Interest Groups (SIGs). Begun informally in the nineteen eighties with a SIG established for the construction industry, these industry-specific interest groups caught fire in 1991. Recognizing this format as a vehicle for organizing and promoting involvement in the Project Earth initiative, a Project Earth SIG was established within PMI in 1992, with the first formal Project Earth SIG meeting held at PMI's 1992 Seminary/Symposium in Pittsburgh, Pennsylvania. Coincidentally, the theme for PMI'92 was "Environment 90s" with an emphasis on management of environmental projects. What better place to start than in this formerly polluted city of "steel", now a beautiful showplace of clean air, beautiful bridges over clean water, and multi-cultural neighborhoods throughout. [3]

PMI's Project Earth SIG was formally established with a Chairman and supporting board. It's mission and objectives were developed in the months following PMI'92, and adapted at a meeting in San Diego, California, in 1993. A newsletter was started and several small projects launched. Most significantly, a Project Earth Track was established for the PMI'93 S/S in San Diego, which included papers on managing environmental projects [4] and an international panel with representatives from Africa, Brazil, Canada, Mexico, Russia and the USA. The PMI'94 S/S to be held in Vancouver, British Columbia, Canada, has now adapted Project Earth as a major theme, in conjunction with "Leadership", and will showcase environmental project management on a grand scale in October, 1994. The Project Earth SIG is coordinating environmental tracks, papers, workshops and other Project Earth-related activities at PMI'94 and future PMI conferences.

2.3 COOPERATION AMONG PROFESSIONAL & NONPROFIT ORGANIZATIONS

From the beginning Project Earth was intended to involve members of PMI, INTERNET and other professional project management associations. Of course many other professional and nonprofit organizations exist specifically related to environmental issues, technologies or industries. In addition many other technical and professional societies have also launched initiatives related to improving environmental awareness or specific programs. Approximately twenty other organizations have now been contacted and are on the Project Earth "mailing list". Other organizations with involvement or interest in environmental projects have been identified. The plan is to share information, initiate some concrete cooperation among these organizations, and to draw upon one another for resources. Initially the intent of the Project Earth SIG is to inform other organizations that this initiative and resource of PM experts exists. Real opportunities and activities will follow.

2.4 INTERNATIONAL PARTICIPATION

Project Earth is intended to be an international initiative. While it has been launched by members of PMI in North America, membership already includes professionals from Australia, Brazil, Canada, Italy, Russia, South Africa, Sweden and the USA. It is hoped that groups of Project Earth participants can be formed in other countries and in other professional societies, in Africa, Asia, Europe, and Latin America. Correspondence and cooperation can be quite easy and productive, including information sharing and promotion. Meetings of international participants can coincide with meetings of INTERNET, PMI or other project management societies.

3. POTENTIAL IMPACT

The Project Earth components might be grouped as follows:

- o Environmental protection embodied in all development projects, worldwide; national, regional and local projects require integration across traditional boundaries to solve problems related to watersheds, the oceans and the atmosphere.
- Remediation projects needed for recovery from environmental damage and resource depletion; air and water quality may be more easily restored in the developed world; everywhere, however, creeping resource and land depletion, coupled with growth in population and per capita consumption, present formidable challenges.
- Economic, social and ecological changes in human consumption, conduct and population expansion, including health and education projects.

All these can contribute to a re-invention of society, in which communities consume renewable resources from the biosphere, or substitutable minerals, with substantial land areas devoted to the benefit of other species.

3.1 GLOBAL CHALLENGES

Space flight has enabled us to view the planet as a whole. Can the developed world, responsible for 80% of global resource consumption, adopt sustainable lifestyles? Can the Project Earth initiative enable us to "develop" the future in manageable "projects", while facing the challenge of managing the big picture (Project Earth)?

Pressing beyond current economics faces great inertia. For example, much existing legislation currently protects rights to abuse agricultural or water resources based, on historical precedent or little-questioned rights to cheap energy. Agreements to manage the "storm of global change" in the areas of consumption, population and the military were elusive at the 1992 UNCED Conference in Rio, highlighting barriers to long term global decisions. Confidence in peace has allowed "demilitarization" in the USA and other countries. The speed at which this takes place, and where resources are reallocated, may be primary indicators of progress towards sustainability. Reductions in consumption and population growth will be further indicators. "Quality of life" indicators used in place of Gross National Product might be a true measure of progress.

How involved will project managers be in the unprecedented changes required to reach sustainability? Can the manager of the development stage of a project be sufficiently informed to appraise the sustainability of the whole project? Social, geographic and ecological complexity make this far from trivial. However, the need to respect global and regional carrying capacities is becoming more obvious. Accepting responsibility creates a powerful moral force. Will this force be sufficient to address the linkage between consumers and the resource extraction, production, distribution and waste associated with products consumed (in pursuit of unsustainable goals)?

What is the balance when sustainability standards for developing countries are seen to be in competition with short term social welfare? As project financing becomes a project in its own right, will sustainability tests be applied for measuring, valuing, conserving and replenishing ecological capital (natural resources) in relation to investment decisions?

3.2 RELEVANT SECTORS OF INDUSTRY

To what industries do these issues most apply? Environmental and energy sectors are the most obvious. In many countries today, billions of dollars are being channeled to environmental cleanup, restoration or remediation projects, with jobs, companies and entire industries being created in the process. The energy sector is directly affected in most areas, including oil & gas extraction, processing and distribution. The utilities will also be required to stop polluting, adapt new technologies, use renewable resources and reduce consumption. (Demand-side energy management is already a major strategy for some American and European utilities). Less obvious, but just as relevant, are the changes needed in mining, manufacturing, agriculture, chemicals, transportation and many other industries where production methods and materials technologies must adapt to changing consumption requirements. While causing major economic impacts on existing industries and organizations, these changes will mean new opportunities for the organizations, technologies and industries responding to the demand for new, better and sustainable approaches.

3.3 OPPORTUNITIES FOR INDIVIDUALS AND COMPANIES

Project Earth should be viewed as an opportunity - to promote environmental, social and economic benefits. Economic benefits can result from the refocus of industry on sustainable projects and activities. There is a lot of work to be done. Cleaning up the environment, and stopping pollution, will create jobs, new technologies and new businesses. The changes required to re-engineer our economies will create jobs, perhaps creating more than are lost as older, less sustainable activities are phased out. At the forefront of these new opportunities will be project managers, many of whom will plan and implement projects.

3.4 OPPORTUNITIES FOR PROFESSIONAL PM ASSOCIATIONS

As formal organizations of project management professionals, societies such as PMI and INTERNET have an opportunity to not only mobilize project management experts to participate in these projects, but to also gain position and credibility among national and international political bodies. PMI, INTERNET and other professional associations should be recognized as resources by the United Nations, the World Bank, the International Red Cross, and other multinational organizations already addressing many global and regional ecological and socio-economic problems.

4. PROJECT EARTH MISSION AND OBJECTIVES

The mission and objectives set for PMI's Project Earth SIG reflect the fact that it is a nonprofit organization of volunteers, with limited resources and time. As the initiative grows and matures, these may be revised. [5]

4.1 MISSION STATEMENT

The Mission of PMI's Project Earth SIG is to provide participants with information and opportunities to successfully plan, manage and participate in projects aimed at solving environmental, social or developmental problems.

4.2 SET OF OBJECTIVES

The following objectives have been established for the Project Earth SIG:

- To demonstrate and promote project management principles, as the most effective means for planning and managing change, and for utilizing resources most efficiently, on projects initiated to solve global problems.
- To establish a network of project management experts and professionals interested in participating in global solutions.
- O To provide information to project management experts, professionals and organizations which can enable participation on projects aimed at solving global problems.
- O To identify opportunities for individuals and companies to participate in projects initiated to solve environmental, social or developmental problems.
- O To provide a resource for organizations involved in addressing global problems.

5. PROJECT EARTH ACTIVITIES

Project Earth Activities which have been initiated include a quarterly newsletter, a database of participants and contacts, tracks of technical papers at PMI conferences, panels and workshops, and special projects.

5.1 PROJECT EARTH QUARTERLY NEWSLETTER

The Project Earth Quarterly (PEQ) is the official newsletter of PMI's Project Earth SIG. Professionally produced and published, the PEQ is distributed to all Project Earth members and those included in the Project Earth Database. Copies are also distributed to PMI Chapters and officers, and to potential participants. The PEQ includes a showcase article; news concerning the Project Earth SIG; letters, writings and information provided by Project Earth participants; listings of upcoming events; summary information on new technologies which might contribute to Project Earth "solutions"; resource information; Global Project Earth News; and other features. Initial issues of the PEQ include a listing of participants, with telephone numbers, to promote communication and usage of the "Network" of experts as a real Project Earth "resource".

5.2 PROJECT EARTH DATABASE

A database of Project Earth participants has been established. This includes names, addresses, telephone and fax numbers, and areas of interest of those who join or participate in Project Earth. This database will eventually be available to all Project Earth participants and organizations, to promote communication, coordination and involvement in Project Earth activities.

5.3 TECHNICAL PAPERS AT PMI CONFERENCES

Fourteen technical papers on project management issues related to Project Earth were presented at the PMI'92 Conference in Pittsburgh. Four major environmental project management technical paper presentations were made at PMI'93 in San Diego. PMI'94 will feature several tracks of technical presentations related to management of environmental remediation projects within the U.S. Department of Energy, sustainable development of natural resources, and several other topics. The Project Earth SIG within PMI will provide a focus for technical papers related to environmental projects at future PMI Seminars and Conferences. It is hoped that a similar initiative can be launched within INTERNET, for future INTERNET conferences and congresses.

5.4 PANELS AND WORKSHOPS

Panels and workshops are also featured at annual PMI Seminar/Symposia. Project Earth will sponsor panel discussions related to highly visible and important environmental or developmental topics, with participation by leaders and PM experts. In addition, workshops and training courses will be offered on various aspects of managing environmental projects. These courses will include seminars on general aspects of managing environmental projects, such as regulatory compliance, environmental technologies, environmental assessments, and socio/political aspects of managing controversial projects. Courses will also be offered on managing specific types of environmental projects such as hazardous waste, hazardous materials, military base closures, nuclear disarmament, projects in dangerous areas and other issues of interest to the project management community. Some of these courses may be offered in cooperation with other professional organizations, institutions or certification programs.

5.5 SPECIAL PROJECTS

In 1993 the following special projects were initiated within the Project Earth SIG:

- o Draft of a Project Earth Education Plan for PMI
- o Identification of Project Earth-related tools & techniques contained in PMI's Project Management Body of Knowledge (PMBOK)
- o Draft of a Project Earth bibliography
- O Draft of a List of Projects for possible Project Earth involvement or support
- o Establishment of a focal point and support for Project Earth track activities at PMI'94 in Vancouver.

These projects are now proceeding, with deliverables scheduled for October, 1994. Other special projects will be initiated as more professionals get involved, or as requests and ideas are received.

PROJECT EARTH NETWORK

6.1 A POWERFUL RESOURCE

Professionals involved in the Project Earth initiative come from all continents, numerous industries, and many nationalities and cultures. This is not surprising as the benefits and value of project management practices and principles can be recognized in all types of endeavors. These people are drawn together by their sincere beliefs that sound project management practices can make the world a better place - locally, nationally, and globally. Due to that shared vision, over time, people are becoming both colleagues and friends. This is a powerful resource which members of Project Earth can draw upon professionally and personally, for knowledge, employment opportunities, advice, and support.

Disciplines in which Project Earth participants are actively involved include education, construction, travel, banking and finance, high technology, marketing/sales, pharmaceuticals, organizational restructuring, executive development, support services, utilities, petroleum, health and medicine, entertainment, telecommunications, sports, disaster recover/reconstruction, research and development, aerospace, environmental, agriculture and biotechnology. Because of the diversity of the group, participants have a wealth of knowledge and experience in project management AND industry from which to tap. This is an important resource for Project Earth participants and their communities. It combines a fresh perspective, based on differing disciplines and cultures, combined with the solid foundation of effective project management practices and principles. These are key elements for promoting and implementing projects for a sustainable future.

6.2 GLOBAL NETWORK OF EXPERTS

Project Management can make a difference! Project managers believe that and are banding together to form a solid network of colleagues spanning the seven continents. The use of technology is playing a vital role, making it easy to obtain information or services from other network members. Communication advances are changing the way business is conducted and how individuals relate to each other. Two people may be half a world apart physically, but, in a "virtual" sense, are really only a touch tone, fax, keystroke or video phone image away from each other.

Likewise, the world is shrinking so fast that there are few projects or endeavors that do not affect a myriad of stakeholders. Having a network of support such as that provided by Project Earth can enhance all activities. (It is amazing how often one finds a reason to seek and/or share information and expert knowledge with another Project Earth colleague. Not only does it help smooth the way for projects in process, it provides the fertile ground for sprouting new business endeavors.) The network can be an invaluable asset to the project manager's "tool kit".

7. VANCOUVER SHOWCASE FOR PROJECT EARTH

PMI's 25-year anniversary will take place at its annual conference in Vancouver, Canada, in October, 1994. Starting from small beginnings at Pittsburgh in 1992, the Project Earth component of the conference has grown to achieve a breakthrough and will cover three main elements of managing for sustainability: "Environmental Protection and Remediation Projects"; worldwide "Developing Sustainability", e.g. through projects to manage major river basins or other geographical zones for the long term; and "Healthy Communities" to highlight community processes and actions for sustainable project results. Consistent with this breakthrough, the traditional source of papers by general invitation has been enhanced by invited presentations to assure a comprehensive and authoritative program.

8. SOCIAL RESPONSIBILITIES OF PROFESSIONAL ASSOCIATIONS

The authors strongly believe that professional associations should not only represent the interests of their members, but should also add value to society. Professionals have a responsibility to use their skills and knowledge, not only in the performance of professional activities and work, but also to improve the social, economic and natural For instance, professionals should continuously attempt to support and improve their profession itself. Professional societies, or even local chapters or branches of professional societies, should also seek opportunities for improving local economies or the environment. For instance, local chapters of PMI most frequently offer programs, workshops and information of most interest to the companies and organizations located within their respective chapter geographical areas, with the underlying objective of helping those organizations become more efficient and Just as importantly, programs, training or successful at managing projects. information can be offered to help solve local or regional environmental or social problems. Since many PM principles and techniques are useful on any project, project management professionals are in a position to offer these concepts and services to anyone with a project related to solving environmental, social or developmental problems. The authors believe it is our collective responsibility to offer this assistance and information.

The project management profession attracts and trains people with the capability to integrate composite problems and disciplines. The world has become not only a single communication network but also a single business and trading network. This connects consumption in one part of the world with a range of social and environmental problems from resource extraction and production in another. Project managers' capacity for global thinking provides opportunities to participate in selecting the right projects. This capacity also suggests a responsibility to advocate projects, be they industrial, educational, agricultural or social, which contribute to sustainability. To understand the connection of a project to the creation or solution of problems implies an ethical responsibility to choose the right projects to work on. This is no easy task, since the trade-offs between benefits, including employment of project managers, and social and environmental depletion, are complex.

9. OPPORTUNITIES FOR LEADERSHIP

The Project Earth initiative offers opportunities for leadership, for motivated professionals and organizations.

9.1 Global Network of Expertise

Key ingredients for project success are passion, vision, and technical skills and expertise. Outstanding project managers have these attributes. That is why project managers are such a valuable resource for leading and managing change. They are passionate about their lives and their profession. They have vision, can see the "big picture" associated with their completed projects. They have many years experience and the technical background and training to carry out the challenging projects needed in today's global arena.

Project Earth members from around the globe are acting on their passions and visions. They are project managers, action and results-oriented professionals. They are ready to participate in the changes going on around them. Not only do they want to be involved, they want to lead the way. That is evidenced by the following examples of leadership through project management passion, vision and expertise from around the world:

- o IRIDIUM the international consortium developing a global telecommunications network to be accessible from anywhere in the world
- o Establishment of a computer education center in Kenya, to improve adult computer literacy and teach skills needed for today's global workplace
- o Restructuring of a Latin American research institute to position it to successfully enter and compete in the global marketplace;
- Building of an industrial development in China, to bring jobs, increase wealth and enhance economic reform in that region;
- Development of faster and faster computer chips every six months (or less) in Silicon Valley in Northern California;
- Exploration of subsurface oceanic environments, that produced the remains of the Titanic, or improve our knowledge of life below Antarctica;
- Renovation of an out-of-date steel plant in Mexico;

All of these activities have project managers, many of whom are directly involved in the Project Earth initiative. They have passion! They have vision and expertise! These are the leaders who are accepting the challenges of the global marketplace. They are teachers, ambassadors, guides, and leaders, and are located on all the continents on Earth. These professionals invite others to join their network of passion, vision and professional camaraderie, to a difference in the world.

9.2 FOCAL POINT FOR SUSTAINABLE DEVELOPMENT

One major challenge is to determine what development is, in fact, sustainable, given the undeniable trends in population, land and species alienation, and environmental degradation. Although there are numerous success stories these remain the exception, while main indicators of well-being even in affluent countries continue to decline ("For the Common Good", Daly and Cobb) [6]. The successes encourage belief that the future is under control and projects can continue as usual. This ignores simple arithmetic, which Rees and Wackernagel have used to demonstrate that to sustain the planet at its present consumption levels, two more planets would be needed to provide a sustainable flow of resources. They use the term "Appropriated Carrying Capacity" as a measure of the area needed outside a community or country to provide for its forestry, agricultural and other material needs.

A "new generation" of projects is required to measure and communicate such effects and to start the transformation needed to lessen the appropriated carrying capacity. This focal point has been lacking from civilization's vision of its future. Can Project Earth become a focal point for sustainable development projects?

9.3 CATALYST FOR ECONOMIC GROWTH

Wherever economic development or growth depends on successful projects, project managers and project management experts are in a position to have a dramatic impact. As project management experts become more experienced and knowledgeable about environmental issues and requirements, sustainable development and other issues external to the project itself, they will have a greater and greater impact on both the success of individual projects and the long term economic impact of those projects. Project managers will become more involved in strategic planning and selection of projects, in addressing external pressures and environmental issues, and in communicating direction and purpose to other project participants. Project Earth is intended to promote better project management of projects in developing economies and regions of the world, to protect the environment but to also reduce the resources required to accomplish project objectives. Environmental consciousness aside, experienced project managers know how to accomplish large endeavors better, faster and cheaper.

9.4 LOCAL LEADERSHIP RESOURCE

Project Earth, and professional project management associations, can provide a resource for local and regional leaders who must address environmental, social and economic problems in their areas. Project management experts can assist in the planning and implementation of most types of projects, with the experience and technical knowledge many political, social and business leaders do not have. By providing assistance or services to these other leaders, Project Earth participants can not only contribute dramatically to solving local problems, but can also establish professional and organizational contacts which might lead to professional growth and other business opportunities. Everyone can win.

10. INVITATION TO INTERNET

The authors want to take this opportunity to invite INTERNET, individual national project management associations, and individual INTERNET members, to join the Project Earth initiative, and to participate on Project Earth activities with PMI's Project Earth SIG. One option is for a Project Earth Interest Group to be established within INTERNET, with whom PMI members can correspond and cooperate. Joint activities can be planned and information exchanged. In addition, we suggest that Project Earth-related topics, such as management of environmental or developmental projects, be included in future INTERNET Congresses. This would seem to be very relevant in the context of Central and Eastern European development, where major environmental problems also exist. We also invite INTERNET experts to join the PMI Project Earth SIG, and to participate in future conferences, workshops and projects. We hope that serious discussions can now be initiated with INTERNET leaders about Project Earth cooperation.

11. CONCLUSION

Project Earth is intended to be a global initiative, addressing global environmental, social and developmental problems and issues. It is intended to stimulate and motivate participation by project management experts in "projects" initiated to address global problems. Project managers do not know everything, but they know how to plan, organize, implement and manage projects. This expertise should be invaluable to those currently responsible for these projects, but who may not have the necessary training or experience. A Project Earth SIG has been established within PMI in the USA, to address needs of project management professionals and companies in the environmental sector, but also to promote the objectives of a larger Project Earth initiative. The authors, who are leaders of PMI's Project Earth SIG, now invite members of INTERNET to join the Project Earth initiative, adding names and resources to the network of PM experts interested in helping solve our common problems.

REFERENCES

- [1] "Our Common Future", <u>Report on the U.N. (Brundtland) Commission on Environment and Development</u>, Oxford University Press, 1987.
- [2] "Project Earth", PMI'90 Speech by Dr. Frank King, *PMNETwork* Magazine, Project Management Institute, Upper Darby, PA, USA Jan., 1991
- [3] "PMI'91 Panel Launches Project Earth SIG", *Project Earth Quarterly*, Vol.1, No.1, Project Earth SIG, PMI, USA. p.3, 1993.
- [4] "Outstanding Project Earth Papers Presented at PMI'93", *Project Earth Quarterly*, PMI, USA. Vol.1, No.4. 1994
- [5] "Project Earth SIG Mission and Objectives Set", *Project Earth Quarterly*, PMI, USA, Vol.1, No.3, p.9, 1993
- [6] DALY, HERMAN E. and COBB, JOHN B., <u>For the Common Good, Redirecting the Economy towards Community, the Environment and a Sustainable Future,</u> Beacon Press, 1989.

David L. Pells

President Strategic Project Management International

Background Summary

David L. Pells is President of Strategic Project Management International (SPM Intl.), a project management consulting and services firm based in Dallas, Texas. SPM Intl. is successfully working on a number of projects in the energy, construction and transportation sectors in Siberia, Russia. With a background of over 16 years in the project management profession in the United States, Mr. Pells is a recognized expert in high-level project planning and project management systems implementation. In the USA Mr. Pells consults to the U.S. Department of Energy, major corporations and laboratories, including the Superconducting Super Collider Laboratory in Texas. Mr. Pells, through SPM Int., is involved in a number of development projects in Russia, including two airport modernization projects, several power stations, oil & gas refineries, and several environmental projects. Mr. Pells is also assisting the World Bank in the development of a major Project Management Training Program for Russia.

Mr. Pells has been a leader in the Project Management Institute (PMI) in North America for the past six years, is the immediate past president of the Dallas Chapter of PMI, is a past president and founder of the PMI Chapter in Idaho, and is a co-founder of the new PMI Chapters in Ft. Worth and Austin, Texas. He is a member of the Association of Project Managers in Great Britain, the International Project Management Association in Europe, and the Russian Project Management Association in Moscow. He has presented papers on various aspects of project management at conferences in Austria, Canada, Italy and the USA, and is currently the Chair of PMI's Project Earth Specific Interest Group. Mr. Pells has a BA in Business from the University of Washington in Seattle and an MBA from Idaho State University. He has resided in Dallas since 1989.

Mr. Chris Quaife, PMP

Summary Bio

Following 20 years in planning, construction, and dispute resolution on industrial and building projects, Mr. Chris Quaife has practiced for seven years as a project management consultant. He has held positions in contract management on oil refinery, pulp mill and hydro-electric construction projects. In his consultancey, Mr. Quaife emphasizes team building and "starting right" on multi-disciplinary projects, especially those with significant non-engineering components. He also provides dispute resolution services and project management instruction. He is a Past Chapter President of the Project Management Institute (PMI), and Past Chairman of the British Columbia Architect-Engineer-Contractor Joint Advisory Committee. He has professional designations in civil engineering and management accounting, and is a Project Management Professional (PMP) and Chartered Arbitrator. Chris is a Project Co-Manager for PMI's 1994 Conference 'Leadership in a World of Change'.

Catherine L. Tonne, PMP

Summary Bio

Catherine Tonne has over 12 years experience in managing environmental, DOD, corporate MIS and high technology projects. Catherine spent the first three years of her career managing environmental and land use projects both as a private consultant and with Henningson, Durham and Richardson (HDR). In 1982 she joined Westinghouse Electric Corporation (WEC) to develop and implement project management processes on large Department of Defense (DOD) projects. Catherine was also responsible for design, implementation and support of major corporate MIS projects at Westinghouse. Catherine is curretly a Project Manager for Triad Systems in Livermore, California, where she has been instrumental in the development and implementation of Triad's Product Development Process (PDP).

Her current responsibilities focus on designing methods to use the PDP effectively and innovatively, to reduce time-to-market for computer hardware, software and information-based products. Catherine received a Bachelor of Arts in Environmental Science from the University of California at Santa Barbara, and a Masters in Business Administration in Information Science from Golden Gate University in San Francisco. She has been active in the Project Management Institute (PMI) in the USA for many years, and is currently the Vice President for Professional Development for the Northern California Chapter of PMI.