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## The introduction of Mosir project: Developments of the movie broadcasting system of our research

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http://www.ep.sci.hokudai.ac.jp/~mosir/index.html

## 1. Introduction

Mosir Project is now trying to develop a system for opening our research to the public and schools through the network. The way of opening our research have been almost limited to oral presentation in each society or paper media, such as journal papers and textbooks so far. Owing to the progress in capability of computers and the broadband, distribution through the network can be used as a practical solution for opening our research to the public. Broadcasting movies through the network is one of these solutions. There are mainly two merits on using the movies for opening our research. The first one is that we can report our results to audiences through their eyes and ears directly. This makes it passible for us to report the many aspects which is difficult to tell by a paper and to show the research results more easily to the citizens. The second one is being able to show research results without meeting. Whenever we receive a request, we can give research informations to users. By using the computer network, a researcher and a user will be connected directly.

2. The outline of our system for opening research

We use Web and streaming techniques for our system. The documents are described with HTML, and the movies recorded by a digital video camera are encoded to real media (rm file). See Sugiyama et al.,(2002) for more detail.

## 3. Results

(1) Seminar

The movies which record regular seminars held at our university are opened to the public without edit. The purpose is to show our discussion and the formation of our natural philosophy with the atmosphere of the seminar.

(2)Workshop

Workshops are recorded with digital video camera, and opened to the public with synchronizing the lecture data with the video.

## (3) Reserch introduction program

We focus on the specific theme and introduce related research and the obsevation institutions. Our purpose is to show the description of the natural phenomenon and the newest research. We have produced two programs so far, one is about Mt.usu, which erupted on march 2000, the ohter is about sea ice on Okhotuku sea.

4. The significance of the presenting accomplishments to the public by reserchers through internet movies.

Since researchers can easily make use of the techniqe of movie broadcasting through the network to present their accomplishment for their own, we expect merits as follows:

(1)Promoting an interaction between different fields

The way of presenting the accomplishment to the public can play new role as the media shared by researchers, followed by papers and Web. It also enable us to present personalities of reserchers and the atmosphere of reseach activities by presenting thir voices and images, which would be diffecult to be expressed by papers. This method would promote the communication between reserchers and make them to establish new relationship.

(2)Improvement in the reserch.

In order to present our accomplishment to the public, we have to confirm the philosophy on which our reserch is based. This confirmation would improve the quality of our reserch. In addition, if many reserchers use our method and present their philosophy to the public, they could make progress through their comparison with each other.

(3) Contribution toward society by research product

We can make an efficient contribution toward sosciety by presentig the reserch acomplishment, because movies has an acceptable form to the public. Providing chance to perceive values and nature philosophy shared by researches, we will be able to arouse intrests in natural science of many people.

5. Reference

1)Mosir Project http://www.ep.sci.hokudai.ac.jp/~mosir/
2)Sinra seminar http://www.ep.sci.hokudai.ac.jp/~sinra/
3)GFD seminar http://www.gfd-dennou.org/arch/gfdsemi/
4)Mt. Usu report http://www.ep.sci.hokudai.ac.jp/~mosir/video/

5)JGN http://www.jgn.tao.go.jp/

6)Sugiyama et al(2002), The Joint Meeting of Earth and Planetary Science