**Ecosystem Services Monitoring Using Remote Sensing,**

**Citizen Science and Other Ground Observations and Current Practices in Vietnam**

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Ecosystems are providing a stream of essential goods and services for the national socio-economic prosperity and welfare; paradoxically, these services have to suffer a high vulnerability against the increasingly uncontrolled use of human beings. World-wide researchers and authorities are working to ensure the sustainability of nature; and scientifically, any methodology aiming to maintain the good services of ecosystem is normally kicked off by analyzing data; regarding this point of view, monitoring data has emphasized its crucial role, especially for natural resources management and planning at both global and local scale. Realistically, monitoring data can facilitate the policy making process and management of natural resources that are rising intricately under high pressure of human interventions.

Vietnam Government gives a high priority in developing the national environment monitoring network; recently, improvement of techniques has changed the approach of water monitoring in the country. In addition to the presenting an overview of ground observation methods conventionally used in Vietnam, this study presents the potential of other monitoring techniques such as remote sensing, sensors, citizen science and their linkage. Finally, an analysis specifying the gap of applications in Vietnam and other parts of the world is provided.

**Keywords:** monitoring, remote sensing, citizen science, sustainable, ecosystem services

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