

Sediment Management in Gharaghaj River in Iran

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For several years, conflicts have been commonplace over management activities involving the waters, bed and banks of the Gharaghaj River. The coarse sediment that characterizes the Garaghaj River has been the subject of particular contention. River gravels are an extremely important resource to the construction aggregate industry, to fishery agencies, and for their role in water-related recreation. Streambank stability is an extremely important concern to riparian land owners. However, there is very little quantitative information on sediment transport and erosion processes in the Gharaghaj River. Therefore, many arguments arise that are based on little factual information or on a misunderstanding of the available information.

A sizable and costly undertaking would be required to obtain the substantial amount of missing information on Gharaghaj River sediment transport characteristics. One problem facing those involved in river management decisions is that it is not clear what kind of information is needed, how much is needed , and how it can be used to improve decisions. Another problem is whether a less-than-comprehensive investigation at a lower but more feasible budget will be sufficiently meaningful when dealing with a highly complex river system like the Gharaghaj . If a full study can not be afforded, there is hesitation to support a much smaller, limited-scope study.

An information dissemination project was conducted to clarify issues and describe the natural physical processes involved in Gharaghaj River sediment management conflicts affecting several diverse groups. Descriptive materials were held and agency cooperation was achieved. As an outgrowth, a large scale fact-finding investigation is now being conducted. The main objective of this paper is to investigate the various faces of sediment management in Gharaghaj River in Fars province in Iran.

The physical processes acting to shape the River on both a geological and a contemporary time scale are discussed. The

dynamic nature of river processes is illustrated. The importance of the river and its potential for conflicts are explained. River management approaches are examined. Finally, some challenging management tasks are identified.