



Ephemerality: spatial extent and catchment condition

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The EU-WFD requires surface and ground waters to achieve good ecological status by 2015. Ecological status is assessed relative to a 'reference condition'. However, in Mediterranean areas reference conditions are difficult to establish due to the seasonal and episodic characteristics of ephemeral streams.

Ephemeral and temporary streams are a natural phenomena resulting from climate, hydro-geomorphology and geology. However, the condition and extent of ephemeral catchments may be intensified by climatic and anthropogenic pressure.

Prior to considering management issues or reference conditions in such environments it is constructive to consider the extent of such streams across Mediterranean Europe. This is approached by considering the environments and processes supporting them. Such an approach will help identify marginal areas which under climate or anthropogenic stress may unduly approach ephemeral status. Once identified, practitioners will be able to apply a more objective approach when implementing the WFD to ephemeral streams.

Derived soil and land condition states are considered as possible indicators of catchment condition (reference condition) to deal with the difficulties that arise when in applying the WFD to ephemeral and temporary streams or when considering small catchments (<10km²) areas which the WFD does not consider but which generate considerable flow and sediment.