

Worksheet 12. Worksheet form for stream classification

Stream Name: _____	
Basin Name: _____	Drainage Area: _____ Ac. _____ mi ²
Location: _____	
Twp.&Rge: _____	Sec.&Qtr.: _____ Lat./Long.: _____
Cross-Section Monuments (Lat./Long.): _____	
Observers: _____	Date: _____

Bankfull WIDTH (W_{bkf}) _____ Ft.
 WIDTH of the stream channel at bankfull stage elevation, in a riffle section.

Bankfull DEPTH (d_{bkf}) _____ Ft.
 Mean DEPTH of the stream channel cross-section, at bankfull stage elevation, in a riffle section. ($d_{bkf} = A/W_{bkf}$)

Bankfull X-Section AREA (A_{bkf}) _____ Ft.²
 AREA of the stream channel cross-section, at bankfull stage elevation, in a riffle section.

Width/Depth Ratio (W_{bkf}/d_{bkf}) _____ Ft./Ft.
 Bankfull WIDTH divided by bankfull mean DEPTH, in a riffle section.

Maximum DEPTH (d_{mbkf}) _____ Ft.
 Maximum depth of the bankfull channel cross-section, or distance between the bankfull stage and thalweg elevations, in a riffle section.

WIDTH of Flood-Prone Area (W_{fpa}) _____ Ft.
 Twice maximum DEPTH, or ($2 \times d_{mbkf}$) = the stage/elevation at which flood-prone area WIDTH is determined in a riffle section.

Entrenchment Ratio (ER) _____ Ft./Ft.
 The ratio of flood-prone area WIDTH divided by bankfull channel WIDTH. (W_{fpa}/W_{bkf}) (riffle section)

Channel Materials (Particle Size Index) D50 _____ mm.
 The D₅₀ particle size index represent the mean diameter of channel materials, as sampled from the channel surface, between the bankfull stage and thalweg elevations.

Water Surface SLOPE (S) _____ Ft./Ft.
 Channel slope = "rise over run" for a reach approximately 20 - 30 bankfull channel widths in length, with the "riffle to riffle" water surface slope representing the gradient at bankfull stage.

Channel SINUOSITY (K) _____
 Sinuosity is an index of channel pattern, determined from a ratio of stream length divided by valley length (SL/VL); or estimated from a ratio of valley slope divided by channel slope (VS/S).

**Stream
Type**

For reference, note: p184, Stream Type Chart; P. 185, Classification Key