



Terminology for Fluvial Sediment¹

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1. Scope

1.1 These terms are to be used by persons involved in collecting, reporting, and interpreting information pertaining to sedimentation and hydrologic processes as they apply in the development, use, control, and conservation of water and land resources.

1.2 Some listed terms and definitions are from other ASTM standards and the source document is given in bold type at the end of the definition.

1.3 The values stated in SI units are to be regarded as standard. No other units of measurement are included in this standard.

2. Referenced Documents

2.1 ASTM Standards:²

D5614 Test Method for Open Channel Flow Measurement of Water with Broad-Crested Weirs

D5640 Guide for Selection of Weirs and Flumes for Open-Channel Flow Measurement of Water

D5674 Guide for Operation of a Gaging Station

D6855 Test Method for Determination of Turbidity Below 5 NTU in Static Mode

D6698 Test Method for On-Line Measurement of Turbidity Below 5 NTU in Water

D7937 Test Method for In-situ Determination of Turbidity Above 1 Turbidity Unit (TU) in Surface Water

3. Terminology

3.1 Terms and Definitions:

accelerated erosion, *n*—erosion at a rate greater than geologic or natural erosion.

DISCUSSION—Accelerated erosion is usually associated with anthropogenic activities and usually reduces plant cover and increases runoff.

¹ This terminology is under the jurisdiction of ASTM Committee D19 on Water and is the direct responsibility of Subcommittee D19.07 on Sediments, Geomorphology, and Open-Channel Flow.

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² For referenced ASTM standards, visit the ASTM website, www.astm.org, or contact ASTM Customer Service at service@astm.org. For *Annual Book of ASTM Standards* volume information, refer to the standard's Document Summary page on the ASTM website.

accretion, *n*—a process of sediment accumulation.

agglomeration or flocculation, *n*—the coalescence of dispersed suspended matter into large flocs or particles which settle rapidly.

aggradation, *n*—the geologic process by which stream beds, flood plains, and the bottoms of other water bodies are raised in elevation by the deposition of material eroded and transported by water from other areas.

alluvial channel, *n*—see **alluvial stream**.

alluvial deposit, *n*—sediment deposited by the action of moving water.

alluvial fans, *n*—sediment deposited in the shape of a segment of a cone formed because of a sudden flattening of a stream gradient especially at debouchures of tributaries on main stream flood plains.

alluvial stream, *n*—a stream whose boundary is composed of appreciable quantities of the sediments transported by the flow and which generally changes its bed forms as the rate of flow changes.

alluviation, *n*—the process of accumulating sediment deposits at places where the flow is retarded.

alluvium, *n*—a general term for all fluvial deposits resulting directly or indirectly from the sediment transport of (modern) streams, thus including the sediments laid down in riverbeds, flood plains, lakes, fans, and estuaries.

ambient light, *n*—light or optical path or both that does not originate from the light source of a turbidimeter. **D7937**

antidunes, *n*—bed forms that occur at a velocity higher than that velocity which forms dunes and plane beds.

DISCUSSION—Antidunes commonly move upstream, and are accompanied by, and in phase with, waves on the water surface.

armoring, *n*—the formation of a resistant layer of relatively large particles by erosion of the finer particles.

attenuation, *n*—the amount of incident light that is scattered and absorbed before reaching a detector, which is geometrically centered at 180° relative to the centerline of the incident light beam. **D7937**

DISCUSSION—Attenuation is inversely proportional to transmitted signal.