

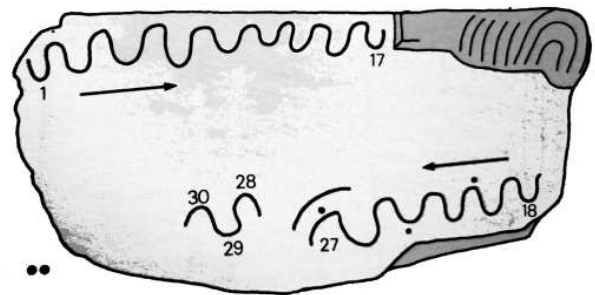


(Left) "Marmaduke" vacuum cleaner cord as undulating line to show motion along with appropriate whooshes and visual clues in modern cartoon art on a static surface.

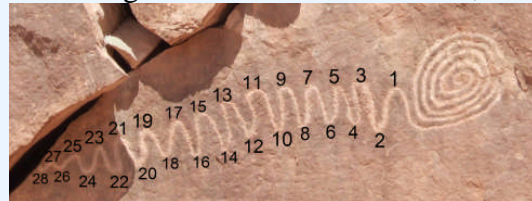
UNDULATING LINE SHOWS MOTION AND COUNT

The semiotics, or science of signs, when applied to the "sign language" of the ancient American Southwest includes the importance of showing or making metaphors for MOVEMENT on the enduring media of stone and painted ceramics. The usefulness of the Undulating Line as a symbol to show **Movement**, particularly of a heavenly body such as the moon or a great comet gracing the skies, needs to be studied in order to understand the ancient visual astronomy recordings available to us in the **American Southwest**—where records can show the same number of days visible as are in the written records from in the Old World.

(Right) Irish megalithic stone day-counter for the moon: the change in direction up and down signifies not only the *movement* of the moon during its phases but also *an actual day-count*, day 1 thru 17 on the top then thru to the 27th day waning crescent and then the 3 days of darkness before the next moon begins again. [Brennan 1994:146].



(Left) Probable counter for an ancient migrating comet—where 41 pecked undulations may record Comet Halley's visit of AD141 when it was watched for 41 days [Yeomans/NASA weblist of "The Great Comets in History"*]. This is separate from other glyphs but adjacent to a supernova of AD185 panel and so this may have been made by the same person or interest group: *day-counter and comet-sign* combined in a **visual astronomy record** of early times along the San Juan River. Bluff, UT.



(Right) Counter of 5 spiral turns plus 28 days is similar to Halley's visits of AD 295 and 374, of 30 and 32 days, respectively,* speaking perhaps of an entity that appears, migrates, and disappears, UT.

(Right) Mimbres glyph with slightly undulating lines shows orbits of 3 Halley's visits, out and back again to the center circle which may be earth. An Anglo Saxon gloss at Canterbury next to a drawing of Halley's comet in 1145 AD described the comet as "returning seldom...and after many winters." The *elliptical orbit* was not understood until Kepler and Edmond Halley did the math, but the return of a certain *hairy star* about every 70 years was known by Jewish rabbinical knowledge even as early as 66 AD and by *astronomers in India as a periodic conch-shaped comet* many hundreds of years before that.

