

## Are there evidences for Noah's Flood?

Prof. Dr. Helmut Brückner

Aus: Helmut Brückner. "Uruk – A Geographic and Palaeo-Ecologic Perspective on a Famous Ancient City in Mesopotamia". In: *Geo-Öko* 24 (2003), 229–248.

Since Woolley (1931) claimed to have found the deposits of the great deluge during his excavations at Ur, evidence for Noah's Flood has been discussed heatedly. Lately, this debate has been revitalized (Tollmann and Tollmann 1993; Ryan and Pitman 1998; Teller et al. 2000; see special box). Palaeogeographic research in southern Mesopotamia may well contribute to this topic. From the corings so far carried out at Uruk there are two choices to detect deposits of such a mega-catastrophe:

- A super-flood event may be "hidden" in the alluvial plain deposits between the top of the dunes and the swamp. Future research must study this sedimentary unit more in detail under this aspect.
- Another candidate is the layer (or part of it) of silty fine sand void of artifacts between 9.55 and 6.25 m b. s. of coring Uruk 2. Intercalated small loamy lenses indicate a water-borne origin. The stratigraphy equals the one at Ur described by Woolley (1931).

After the dating of the corings at Uruk, these layers must be compared with extraordinary flood deposits described from several other tells of Mesopotamia.

### Exkursus on Noah's Flood

Gilgamesh is the legendary king of Uruk. His epic tells, among others, the story of a great deluge. Many parallels to Noah's Flood (Genesis 6–8) are evident. Therefore, palaeogeographic research in Uruk may contribute to the ongoing debate on this topic. The geoscientific perspective focuses on four possible scenarios for the explanation of the Genesis Flood:

- *Transgression of the Persian Gulf*: Due to deglaciation at the end of the Pleistocene, sea level rose from c. -125 m around 18,000 years ago to its present level around 6,000 years ago. Since the Persian Gulf is a shallow shelf sea this transgression caused enormous floodings in a relatively short time. This must have affected nearshore Neolithic civilizations considerably (see Sarnthein 1972; Teller et al. 2000). The experience of the permanent landward shift in the shoreline and the massive flooding of vast areas was later condensed in the legend of one world-devastating flood.
- *Counter argument*: The transgression lasted many human generations. People could still shift their dwelling places accordingly. It is therefore unlikely that this is the essence of the Genesis Flood which reflects a unique single event.
- *Cosmic impact*: Ten years ago, A. Tollmann, professor emeritus of geology at the University of Vienna, published this hypothesis (Tollmann and Tollmann 1993): 9,545 years ago, a comet hit the Earth. Shortly before the impact it broke up in seven pieces which fell into the oceans, thus triggering worldwide tsunami waves. This would well explain why many peoples have a saga of a once world-devastating flood. The geologic background for this scenario is the cosmic impact at the Cretaceous/Tertiary boundary which terminated the Mesozoic Era.
- *Counter argument*: Definite geologic evidence is still missing. It will be nearly impossible to detect any remains on the ocean floor, and—even if so—to date their synchronous impact. The minor traces on land are not convincing.

- *Flooding of the Black Sea*: During the Holocene transgression the rising level of the Mediterranean Sea surpassed the sill of the Bosphorus 7,600 years ago. The sudden catastrophic flooding caused a tremendous rise of the Black Sea level which had by then sunk to -150 m. The survivors of the deluge fled in all directions, carrying the memory of this horrible experience with them (Ryan and Pitman 1998).
- *Counter argument*: The bathymetry at the exit of the Bosphorus into the Black Sea does not support the idea of a catastrophic inflow. Recently, a submarine alluvial fan was discovered at the exit of the Bosphorus into the Marmara Sea, indicating a waterflow in the opposite direction to that postulated by Ryan and Pitman. The ethnological scenario of the authors has no archaeological or historical background.
- *Flood layers in tells*: The search for flood deposits within the settlement hills was triggered by Sir C. Leonard Woolley's excavations at Ur south of Uruk in the 1920's. Woolley (1931) ascribed a more than 2.5 m thick homogeneous loam void of artifacts to Noah's Flood. Below this layer are traces of an early civilization which had been buried by a great flood. The hanging layers were those of the pure Sumerian civilizations. Systematic search has shown that other tells in middle and southern Mesopotamia, e. g. Kish (Tell al-Uhaimir) and Shuruppak (Tell Fara), also have layers which may be interpreted as deposits of a great flood.
- *Counter argument*: There are many open questions: Are these synchronous layers? Do they originate from a catastrophic event? Does their deposition reflect a sudden accumulation?

**Synopsis:** From the present point of view, the last scenario is the most reasonable geoscientific explanation. It seems that Mesopotamia was subject to a mega-flood around 2900 BC. It is noteworthy that the first prosaic texts that came to us are in cuneiform lettering and date from the late 4th

millennium BC. It is quite possible that the Gilgamesh Epic and the Biblical Flood story originally draw their essence from the same (written?) source. A unique rise in the water table of the Euphrates and Tigris, e. g. caused by extraordinary and long-lasting rains in their source area, plus a southern wind blocking the drainage into the Persian Gulf, may have drowned the extremely flat central and southern Mesopotamia completely.

### References

- Ryan, William, and Walter Pitman. 1998. *Noah's flood: The new scientific discoveries about the event that changed history*. New York: Simon & Schuster.
- Sarnthein, Michael. 1972. "Sediments and history of the Postglacial transgression in the Persian Gulf and northwest Gulf of Oman." *Marine Geology* 12 (4): 245–266.
- Teller, J.T., K.W. Glennie, N. Lancaster, and A.K. Singhvi. 2000. "Calcareous dunes of the United Arab Emirates and Noah's Flood: The postglacial reflooding of the Persian (Arabian) Gulf." *Quaternary International* 68–71:297–308.
- Tollmann, Alexander, and Edith Tollmann. 1993. *Und die Sintflut gab es doch: Vom Mythos zur historischen Wahrheit*. München: Droemer Knauer.
- Woolley, Leonard. 1931. *Ur und die Sintflut: 7 Jahre Ausgrabungen in Chaldäa, der Heimat Abrahams*. 6th ed. Leipzig: F. A. Brockhaus.