



BIWEEKLY COLLOQUIUM  
Monday, December 12<sup>th</sup>, 4:15 p.m.

**INTERDISCIPLINARY APPROACHES TO UNDERSTANDING  
THE EFFECTS OF SEVERE DROUGHT  
IN THE 'CLASSIC MAYA COLLAPSE'**

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Increasing evidence supports the role of severe drought in the disintegration of regional polities in the Maya Lowlands at the end of the Classic Period (750 to 1000 C.E.). Despite the large corpus of archaeological literature on the topic, the effects of climate change remain highly debated in the absence of Classic Period textual evidence indicating direct impacts of drought on agricultural productivity and political structures over this broad geographic area. In this presentation I present interdisciplinary approaches to better understand the impact of severe drought on agricultural production, demography, and political structures of Classic Maya kingdoms. First I discuss the history of archaeological research on the 'Classic Maya collapse', detailing the complex social and environmental processes that contributed to the breakdown of political systems across the region. Next, I review over 20 years of paleoclimate studies from across the area, describing the evidence for severe drought identified in the terrestrial and lacustrine proxy records. To test chronological correlations between the climate proxy records and historic events, I present historical accounts of drought in the northern Yucatan peninsula during the Early Colonial period (1500-1800 C.E.). Finally, I present the preliminary results of high-precision AMS <sup>14</sup>C dates and stable isotope measurements on human skeletal remains from several sites across the Maya Lowlands to explore the impact of drought on subsistence and human demography at the end of the Classic period.

**Venue: Leibnizstraße 1, Seminar Room 204**