

地质力学学报

Journal of Geomechanics

国际标准刊号 ISSN 1006-6616
国内统一刊号 CN 11-3672/P

[首页](#)[期刊介绍](#)[编委会](#)[投稿须知](#)[相关下载](#)[征订指南](#)[常见问题](#)[联系我们](#)

西藏札达盆地上新世—早更新世气候变迁与湖泊演化

投稿时间: 2011/6/19 [点此下载全文](#)

引用本文: 韩建恩, 余佳, 朱大岗, 孟宪刚, 邵兆刚, 杨朝斌. 西藏札达盆地上新世—早更新世气候变迁与湖泊演化[J]. 地质力学学报, 2011, 17(4): 361-372

摘要点击次数: 54

全文下载次数: 56

作者	单位
韩建恩	中国地质科学院地质力学研究所, 北京 100081
余佳	中国地质科学院地质力学研究所, 北京 100081
朱大岗	中国地质科学院地质力学研究所, 北京 100081
孟宪刚	中国地质科学院地质力学研究所, 北京 100081
邵兆刚	中国地质科学院地质力学研究所, 北京 100081
杨朝斌	西藏自治区国土资源厅, 拉萨 850000

基金项目: 中国地质调查局项目“青藏高原第三纪重点古湖泊环境演变序列”(任务书编号: 科[2005]005—02; 工作项目编码: 1212010511902)和国家自然科学基金项目(编号: 40572134)共同资助。

中文摘要: 通过孢粉组合分析, 结合河湖相地层岩性特征和古地磁及电子自旋共振(ESR)法年龄测定结果, 探讨了西藏札达盆地上新世—早更新世的古气候变迁与札达古湖泊演化的关系。研究表明, 札达盆地古湖泊演化可划分为早(湖泊形成期)、中(稳定发展期)、晚(湖泊消亡期)三期。早期(距今5.41~4.40 Ma), 札达盆地为温凉而干旱的疏林草原植被气候, 随后转变为温暖稍湿的森林草原植被气候, 最后转变为温暖潮湿的亚热带针阔叶混交林气候, 这一时期古湖开始形成; 中期(距今4.40~2.57 Ma), 古气候进入寒温带期, 古植被表现为先由暖温带针阔叶混交林带向山地寒温带暗针叶林带过渡, 再由山地暖温带针阔叶混交林→山地寒温带暗针叶林交替出现的过程, 古湖泊进入发育期; 晚期(距今2.57~1.36 Ma), 湖区古气候环境进入寒冷期, 古植被为山地寒温带暗针叶林→山地暗针叶林向低矮灌木→干冷草原的变化, 古湖泊进入消亡阶段。古湖泊演化与古植被、古气候演变有很好的相关性, 高原隆升控制了古气候环境的变化, 进而影响湖泊水量的变化。

中文关键词: [西藏](#) [札达盆地](#) [上新世—早更新世](#) [气候变迁](#) [湖泊演化](#)

CHANGE OF THE PALEOCLIMATE AND EVOLUTION OF THE LAKE DURING PLIOCENE-EARLY PLEISTOCENE IN ZANDA BASIN, TIBET

Abstract: According to the pollen combination analysis, paleomagnetic chronology, electron spin resonance (ESR) age of fluviolacustrine facies deposition and lithology characteristics, this paper discussed the relationship between paleoclimate and the evolution of Zanda paleolake during Pliocene-early Pleistocene in Zanda basin, Tibet. Study shows that the Zanda paleolake has went through three phases: early marsh period, the medium-term developing period and late dying out of lake period. The Zanda paleolake began to take shape in early period (5.41~4.40 Ma). The paleoclimate of Zanda basin firstly was woodland and grassland vegetation in arid climate with less warm, then into a warm and slightly wet climate of the forest-steppe vegetation, and finally into a warm and humid subtropical mixed forest climate. The Zanda paleolake was developing in the medium-term (4.40~2.57 Ma). The paleoclimate was into the cold period, reflected by the paleovegetation firstly from warm temperate zone of coniferous-broad leaf forests to mountain cool temperature zone of dark coniferous boreal forest, and then from mountain warm temperate zone of coniferous-broad leaf forests alternating process. The Zanda paleolake was disappearing in late period (2.57 ~ 1.36 Ma). Paleoclimate and paleoenvironment was into the cold period, with the paleovegetation alternating change from mountain dark coniferous forest and mountain dark coniferous forest to the low-shrub steppe and dry and cold grassland. Evolution of the Zanda paleolake has good relationship with the change of the paleovegetation and paleoclimate. Uplift of the plateau has controlled the paleoclimate and paleoenvironment changes, thereby affected the quantity of the lake changes.

keywords: [Tibet](#) [Zanda Basin](#) [Pliocene-early Pleistocene](#) [change of the paleoclimate](#) [evolution of the lake](#)

[查看全文](#) [查看/发表评论](#) [下载PDF阅读器](#)

你是第**285400**访问者

版权所有 © 2008 《地质力学学报》编辑部 京ICP备05055765号

北京市海淀区民族学院南路11号 邮编: 100081

网址: <http://journal.geomech.ac.cn/ch/index.aspx>

本系统由北京勤云科技发展有限公司设计