Geophysical Research Abstracts, Vol. 7, 09132, 2005 SRef-ID: 1607-7962/gra/EGU05-A-09132 © European Geosciences Union 2005



Pattern of periglacial and glacial lakes in central Yakutia

F. Lehmkuhl

Department of Geography, RWTH Aachen University, Germany

Flehmkuhl@geo.rwth-aachen.de / Fax: +49 241 8092157 / Tel +49 241 8096064

The distribution of thermokarst lakes (Alases) has been studied on different geomorphological units in eastern Siberia. In the Lena-Aldan Basin most of the lakes are distributed on the late Pleistocene terrace surfaces (Tyungyulyu terrace). On the higher terrace (e.g. Bestyakh terrace) only a few lakes exist. The Alas lakes are wind orientated (NW-SE). Investigations in the foreland of the Verkhoyansk Mountains show several Pleistocene moraine sequences. Whereas only a few lakes are distributed on the outermost moraines there are hundreds of lakes on the youngest moraines. In our opinion it's a combination of kettle holes and alas. They show no orientation. The Alases on the Tyungyulyu are the densest populated rural regions of Central Yakutia. Recent widening of the Lakes, extensive pollution, and support of the people with clean drinking water are major problems.