1046-06-662 **Andres Navas*** (anavas@usach.cl), Univ. de Santiago, Dp. Matematicas, Alameda 3363, Santiago, Chile, Santiago, Chile. *The Conrad property for left orderings on groups from a topological and a dynamical viewpoint.*

According to the work by P. Conrad, an ordering $\preceq$ on a group satisfies the condition C (or is Conradian) if for every $a \succ e$ and $b \succ e$ there exists $n \in \mathbb{N}$ such that $ab^n \succ b$. I plan to concentrate on two aspects of this property:

Topology: If the C-property holds then it holds for $n = 2$. This apparently innocuous remark implies that the space of Conradian orderings, endowed with a natural topology, is a compact space; moreover, it is homeomorphic to the Cantor set when it is nonempty and the group is non-solvable. Furthermore, it allows providing a new and short proof of the fact that a group admits a C-ordering if and only if it is locally indicable.

Dynamics: If the C-property holds and the group is countable, then an associated action by homeomorphisms of the real line has a special combinatorial property, namely there is no *resilient orbit* for the action. This notion has been studied by specialists on codimension-one foliations. Using techniques from this theory, this allows "visualizing" many properties which are equivalent to the Conradian one, although providing combinatorial proofs of the equivalence seems to be very hard. (Received September 09, 2008)