Product overview

Aluminium linear rail systems are designed especially for all sorts of linear movements and are therefore suitable for use in most type of machinery. The rails consist of extruded aluminium having two pressed-in hardened stainless steel profiles serving as the raceways for the balls of the runner blocks. Advantages are the light weight and corrosive resistant materials. Fixing holes in the attachment surfaces enable machine parts to be directly mounted onto the runner blocks. With this combination it is possible for us to offer a guide system which achieves a good price/performance ratio.

There are two versions of carriages: Flanged and narrow. The blocks are stocked with clearance and standard precision. In case preload and for higher precision "P" is needed, please contact Rollco. The load rating is based on a service performance of 100 km.

Performance Characteristics

- · Compact, light-weight design with a weight saving of 60% compared to steel versions.
- Same connection dimensions as steel ball rail systems.
- Much greater parallelism and height offsets of mounting bases possible.
- Insensitive to aggressive environment (such as dust, shavings).
- Significantly better corrosion resistance in comparison to the steel versions.
- Runner blocks initially greased in-factory, therefore provided with long-term lubrication.
- Due to ball retainers, runner blocks can be removed from the rail without any loss of balls.
- Complete interchangeability between runner blocks and rails.
- Both sides of the rail are reference sides. The runner block has one reference side, which can be verified by turning it on the rail.

Application Range

Speed $v_{max} = 2 \text{ m/s}$ Acceleration $a_{max} = 30 \text{ m/s}^2$ Temperature $T = 0^{\circ}$ - 60° C

Applications

If you look at the above limits, you will see that a broad area of applications are possible. Especially in light machinery, handling technology, jigs and fixtures, assembly technology, manual displacement systems, machine enclosures, door and window technology, booth- and store construction and much more.

Our rail guides can not be used in:

- Main axis of a CNC or tooling machine
- Enviroments with aggressive dusts
- Oscillating conveyor
- · Unsecured overhead installations etc. (due to danger of life or physical injuries)