Mast Chain

Mast Chains - Used in various applications, leaf chains are regulated by ANSI. They can be utilized for forklift masts, as balancers between counterweight and heads in some machine gadgets, and for tension linkage and low-speed pulling. Leaf chains are at times even called Balance Chains.

Features and Construction

Made of a simple link plate and pin construction, steel leaf chains is identified by a number that refers to the lacing of the links and the pitch. The chains have certain features like for example high tensile strength for every section area, that allows the design of smaller devices. There are A- and B- type chains in this series and both the BL6 and AL6 Series include the same pitch as RS60. Finally, these chains cannot be powered with sprockets.

Selection and Handling

In roller chains, the link plates maintain a higher fatigue resistance due to the compressive tension of press fits, yet the leaf chain just contains two outer press fit plates. On the leaf chain, the most acceptable tension is low and the tensile strength is high. If handling leaf chains it is important to consult the manufacturer's guidebook to be able to ensure the safety factor is outlined and use safety guards all the time. It is a better idea to apply extreme care and use extra safety measures in applications wherein the consequences of chain failure are severe.

Higher tensile strength is a direct correlation to the utilization of more plates. Because the utilization of much more plates does not improve the utmost permissible tension directly, the number of plates could be limited. The chains need frequent lubrication in view of the fact that the pins link directly on the plates, producing an extremely high bearing pressure. Utilizing a SAE 30 or 40 machine oil is normally advised for most applications. If the chain is cycled more than 1000 times every day or if the chain speed is more than 30m per minute, it will wear really rapidly, even with continual lubrication. Thus, in either of these situations the use of RS Roller Chains would be a lot more suitable.

The AL-type of chains must only be utilized under certain situations like for instance if wear is not a big issue, when there are no shock loads, the number of cycles does not exceed a hundred day after day. The BL-type would be better suited under different situations.

The stress load in components will become higher if a chain with a lower safety factor is chosen. If the chain is even used among corrosive conditions, it could easily fatigue and break very quick. Doing frequent maintenance is really vital when operating under these kinds of situations.

The kind of end link of the chain, whether it is an inner link or outer link, determines the shape of the clevis. Clevis connectors or also called Clevis pins are made by manufacturers but normally, the user supplies the clevis. An improperly made clevis can decrease the working life of the chain. The strands must be finished to length by the producer. Check the ANSI standard or phone the maker.