Mast Chain

Mast Chains - Leaf Chains consist of various functions and are regulated by ANSI. They are used for lift truck masts, for low-speed pulling and tension linkage, and as balancers between counterweight and head in certain machine gadgets. Leaf chains are at times likewise called Balance Chains.

Construction and Features

Constructed of a simple pin construction and link plate, steel leaf chains is identified by a number which refers to the lacing of the links and the pitch. The chains have certain features such as high tensile strength per section area, which enables the design of smaller mechanisms. There are A- and B- type chains in this particular series and both the AL6 and BL6 Series contain the same pitch as RS60. Lastly, these chains cannot be powered using sprockets.

Selection and Handling

In roller chains, the link plates maintain a higher fatigue resistance due to the compressive stress of press fits, yet the leaf chain only has two outer press fit plates. On the leaf chain, the most permissible tension is low and the tensile strength is high. Whenever handling leaf chains it is essential to check with the manufacturer's instruction booklet to be able to guarantee the safety factor is outlined and utilize safety guards at all times. It is a great idea to exercise extreme caution and utilize extra safety guards in applications where the consequences of chain failure are severe.

Using a lot more plates in the lacing leads to the higher tensile strength. Because this does not improve the utmost permissible tension directly, the number of plates used can be limited. The chains need frequent lubrication because the pins link directly on the plates, generating a really high bearing pressure. Making use of a SAE 30 or 40 machine oil is often advised for most applications. If the chain is cycled more than 1000 times day after day or if the chain speed is more than 30m for each minute, it would wear very fast, even with continuous lubrication. Hence, in either of these situations the use of RS Roller Chains will be much more suitable.

The AL-type of chains should just be utilized under certain conditions like if wear is really not a huge concern, when there are no shock loads, the number of cycles does not go over a hundred every day. The BL-type would be better suited under other situations.

The stress load in parts would become higher if a chain using a lower safety factor is chosen. If the chain is even utilized amongst corrosive situations, it could easily fatigue and break very quick. Doing regular maintenance is vital if operating under these types of situations.

The type of end link of the chain, whether it is an outer link or inner link, determines the shape of the clevis. Clevis connectors or likewise 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 should be finished to length by the manufacturer. Refer to the ANSI standard or call the manufacturer.