Mast Chain

Forklift Mast Chain - Used in various applications, leaf chains are regulated by ANSI. They can be utilized for lift truck masts, as balancers between counterweight and heads in some machine devices, and for low-speed pulling and tension linkage. Leaf chains are occasionally even called Balance Chains.

Construction and Features

Leaf chains are actually steel chains with a simple pin construction and link plate. The chain number refers to the lacing of the links and the pitch. The chains have specific features like high tensile strength for each section area, that enables the design of smaller machines. There are A- and B- type chains in this series and both the BL6 and AL6 Series comprise the same pitch as RS60. Finally, these chains cannot be powered using sprockets.

Handling and Selection

Comparably, in roller chains, all of the link plates have higher fatigue resistance because of the compressive stress of press fits, while in leaf chains, just two outer plates are press fit. The tensile strength of leaf chains is high and the maximum acceptable tension is low. While handling leaf chains it is essential to confer with the manufacturer's guidebook in order to guarantee the safety factor is outlined and use safety guards all the time. It is a good idea to exercise extreme care and utilize extra safety measures in applications wherein the consequences of chain failure are severe.

Higher tensile strength is a direct correlation to the use of much more plates. Since the utilization of more plates does not enhance the maximum allowable tension directly, the number of plates could be limited. The chains require frequent lubrication for the reason that the pins link directly on the plates, producing a very high bearing pressure. Utilizing a SAE 30 or 40 machine oil is normally suggested for the majority of applications. If the chain is cycled over 1000 times every day or if the chain speed is more than 30m per minute, it will wear extremely rapidly, even with constant lubrication. Therefore, in either of these conditions utilizing RS Roller Chains would be more suitable.

The AL-type of chains should just be used under particular conditions such as when wear is really not a huge problem, when there are no shock loads, the number of cycles does not go beyond a hundred a day. The BL-type will be better suited under other situations.

The stress load in parts would become higher if a chain using a lower safety factor is selected. If the chain is also utilized among corrosive situations, it could easily fatigue and break really quick. Performing frequent maintenance is important if operating under these types of situations.

The outer link or inner link type of end link on the chain will determine the shape of the clevis. Clevis connectors or also known as Clevis pins are made by manufacturers, but the user usually supplies the clevis. A wrongly made clevis could lessen the working life of the chain. The strands must be finished to length by the manufacturer. Check the ANSI standard or get in touch with the manufacturer.