Mast Chain

Mast Chains - Leaf Chains comprise various functions and are regulated by ANSI. They are utilized for lift truck masts, for low-speed pulling and tension linkage, and as balancers between head and counterweight in some machine tools. Leaf chains are occasionally also known as Balance Chains.

Features and Construction

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

Selection and Handling

Comparably, in roller chains, all of the link plates have higher fatigue resistance because of the compressive stress of press fits, whereas in leaf chains, only two outer plates are press fit. The tensile strength of leaf chains is high and the maximum permissible tension is low. When handling leaf chains it is vital to confer with the manufacturer's handbook in order to guarantee the safety factor is outlined and utilize safety measures all the time. It is a better idea to exercise utmost caution and utilize extra safety measures in functions where the consequences of chain failure are severe.

Higher tensile strength is a direct correlation to the use of a lot more plates. As the use of more plates does not improve the utmost acceptable tension directly, the number of plates may be limited. The chains require frequent lubrication since the pins link directly on the plates, generating an extremely high bearing pressure. Making use of a SAE 30 or 40 machine oil is often suggested for nearly all applications. If the chain is cycled more than one thousand times day after day or if the chain speed is more than 30m for every minute, it will wear very quick, even with continuous lubrication. So, in either of these conditions utilizing RS Roller Chains will be much more suitable.

AL type chains are only to be used under certain situations like for instance where there are no shock loads or when wear is not really a big concern. Be certain that the number of cycles does not go over one hundred per day. The BL-type will be better suited under different conditions.

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

The inner link or outer link type of end link on the chain will determine the shape of the clevis. Clevis connectors or otherwise known as Clevis pins are made by manufacturers, but the user typically supplies the clevis. An improperly constructed clevis could lessen the working life of the chain. The strands must be finished to length by the maker. Check the ANSI standard or contact the producer.