Winch and Hoist Application Guidelines

Calculating Fleet Angle

To prevent excessive wire rope wear and damage and ensure the safety of operators, a location that permits proper fleet angle is necessary to let the wire rope spool uniformly onto the drum. Proper fleet angle is between 1/2° and 1-1/2° measured as illustrated in the example below. As a general "rule of thumb", the absolute minimum distance from the winch to a fixed sheave should be equal in feet to the drum length in inches. For example, a 12" wide drum requires a fixed sheave at least 12' feet away for proper spooling.

