

SZ Stranding Line



1. Introduction

With the rapid development of optical communications, the amount of optical fiber loose tube cable for outdoor has increased rapidly. However, the capacity of the optical fiber in the loose tube is limited and it is impossible to make the loose tube large. In addition, in order to facilitate the connection identification of optical fibers and the distribution of optical nodes, the number of optical fibers in every loose tube should not be too large. For large-capacity communication requirements, the loose tube can only be twisted into cables according to certain rule.

The stranding of optical fiber cable can increase the number of optical fiber cores to meet the requirements of large-capacity communication. After the loose tube is twisted at a certain pitch, its cable core structure will become very stable, which is helpful for future construction. Because the loose tube is twisted according to a certain spiral angle, the soft performance of the cable is improved. Due to the stranding, the loose tube has a certain stranding radius, which increases the excess length of the optical fiber compared to the optical fiber and improves the environmental resistance of the optical cable.

At present, there are SZ stranding method and one-way (S or Z) stranding method for fiber optic cable. Because SZ stranding has the effect of canceling the stress of cable formation, SZ stranding is mainly used at present.

The so-called SZ stranding is when the stranding element reaches the specified S direction (or Z direction) number of twisted revolutions along the longitudinal axis of the optical fiber cable, and then reverse direction to stranding the same S direction (Or Z direction) twisting numbers along the Z direction (or S direction). After the same number of turns of twisting, the twisting form of another twisting cycle is restarted. The quality of the SZ stranding process directly affects the performance of the finished optical fiber cable.

The realization of the SZ stranding process is completed by the SZ stranding line. Our company has many years of experience in the research and development of optical fiber cable production equipment. The SZ stranding line can be used for stranding (1 ~ 12) core optical fiber loose tube with fast production speed, high production efficiency, stable stranding pitch and other characteristics.

2. Main Technical Parameters

The main technical parameters of the equipment are as follows:

Model	LT07-6/800/1250
Loose tube diameter/Number of tube	(ϕ 1.2mm ~ ϕ 4.0mm)/6;

	(ϕ 4.0mm ~ ϕ 10.0mm) /6
Structure speed (m/min)	100
Production speed (m/min)	90
(Binding pitch=25mm, stranding pitch=65mm)	
Binding pitch (mm)	20 ~ 50
Stranding pitch (mm)	50 ~ 200
SZ stranding angle	$\pm 4\pi \sim \pm 18\pi$
SZ stranding head speed (rpm)	Max. 2000
Binding head speed (rpm)	Max. 4500
Bobbin size	PN630 ~ PN800/ PN800 ~ PN1250

Product link : <https://www.linttop.com/sz-stranding-line.html>