

Technical Report 10122015: Using Two Twin-Path® Slings Together

Slingmax[®] requests for larger capacity Twin-Path[®] Slings have increased drastically over the past few years. Some of these slings cannot be fabricated due to the logistics of constructing such high capacity slings. Therefore, Slingmax[®] will make the recommendation of either using one sling in an inverted basket, or using two smaller capacity slings together. To ensure that there was no loss of efficiency, Slingmax[®] conducted a test with two slings being used side by side.

Testing

Three TPXCF8500 x 10ft were constructed. Each sling was assembled on the same Roundsling machine independently. The first TPXCF8500 was tested alone. This Twin-Path® Sling broke at 541,500 lbs or at a 6.3:1 Design Factor.

Next, the remaining two TPXCF8500 were rigged into the test machine in a side by side configuration. These Slings ultimately failed at 1,058,000 lbs or at a 6.2:1 Design Factor.

Table 1 – Test Results

Serial Number	Sling	Length	WLL (lbf)	Break (lbf)	Design Factor
C091510N	TPXCF8500	10ft	85,000	541,500	6.3:1
C091511N & C091512N	(2ea)TPXCF8500	10ft	170,000	1,058,000	6.2:1

Figure 1 – (2ea) TPXCF8500 Test Configuration



Conclusion

The results of the test showed that there is effectively no loss of efficiency when using two Twin-Path[®] Slings together – 98% of strength was maintained. As well, this proves that when utilizing the Twin-Path[®] Roundsling machine Twin-Path[®] Slings can be constructed to identical lengths.