




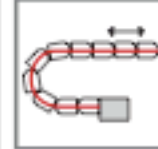
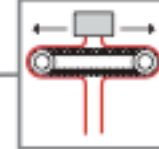


# BENDING RADII

Table 1

		TYPE OF USE									
OPERATING VOLTAGE (V)	CABLE'S OVERALL DIAMETER (mm <sup>2</sup> )	FIXED INSTALLATION	ANCHORING REEL	FESTOONS	CABLE WINDING REELS		BASKET	CABLE CARRIER CHAINS	CABLE TENDER SYSTEMS	GUIDE PULLEY SYSTEMS	
											
≤ 1000	< 8.0	3xOD	3xOD	3xOD	5xOD	5xOD	-	8xOD	8xOD	7.5xOD	7.5xOD
	< 12.0	3xOD	3xOD	4xOD	5xOD	5xOD	-	9xOD	9xOD	7.5xOD	7.5xOD
	≤ 20.0	4xOD	3xOD	5xOD	5xOD	5xOD	-	10xOD	10xOD	7.5xOD	7.5xOD
	> 20.0	4xOD	3xOD	5xOD	6xOD	6xOD	15xOD	11xOD	11xOD	7.5xOD	7.5xOD
1000		6xOD	10xOD	10xOD	12xOD	12xOD	-	10xOD	10xOD	15xOD	15xOD

The above table gives the recommended minimum bending radii for different cable uses. Observance of these recommendations and a precise calculation of the bending radius is important as one of the most important factors of reliability. Increase on minimum bending radius has a more than proportional effect on the life of a cable because it causes stretching and internal torsions due to increased mechanical stresses in the conductors.

As the frequency of movements is important, a tighter bending radius may be considered where movement is slow and occasional.

Care must also be taken and limits imposed on design where pulleys or guide rollers (same radii as for collection reels) are present or where there is a flexion and torsional stress due to reel being parallel to the line of travel of the machine.