

SPIRAL CONVEYOR SYSTEM WITH DIRECT CAGE ENGAGEMENT

ABSTRACT

Disclosed herein are embodiments of a spiral conveyer belt system. Embodiments of the system allow for a longer compressed pitch and improved engagement/disengagement interactions between a drum and an inner edge of a spiral conveyor belt while maintaining necessary product support and belt support strength. In part, the disclosures relate to a grooved, “ribless” cage bar cap, wherein grooves extend below an outer-facing surface of the cage bar cap and are configured to engage with a belt support rod inner-end or a belt-link tab. The bar cap groove may be straight (generally orthogonal to the outer-facing surface) or angled to better engage and drive the belt so the belt cannot slip forwards or outwards with respect to a drum outer boundary.

FIG.6A