Chek Mate® Belt Matching

When multiple belts with slight variations in length are used on a single drive, some belts may appear to hang unevenly or “sag.” If belts are not matched, the shortest belt carries the load. This prevents the belts from working together as a team to achieve the full horsepower capacity of the drive. “Matched belts” are required to obtain optimal performance and belt life on a multiple-belt drive. In the past, a “sag number” or “matching code” was needed to identify variation from the target specification. Chek Mate replaces the need for finding belts with a matching number, because all Carlisle belts by Timken branded with the Chek Mate symbol will match.

Belt Matching
- All manufacturing processes have variation
- One key belt variation is length
- Optimal performance on drives with multiple belts requires “Matched Belts”

Chek Mate®
- Chek Mate® is a process that manufactures belts to meet or exceed Association for Rubber Products Manufacturers (ARPM) tolerances for a matched set
- Matching numbers are not required on these Carlisle belts which carry the distinctive Chek Mate logo or symbol: Super Blue Ribbon®, Super II®, Super Power-Wedge®, Power-Wedge® Cog-Belt® and Gold-Ribbon® Cog-Belt®
- Maximizes belt life and performance by eliminating mismatching

Importance of Using Matched Sets
- When it’s time to change one belt on a multiple-belt drive, replace all belts with a matched set of new belts. This allows the load to be properly shared between each belt.
- Unmatched belts may cause sheaves and belts to wear unevenly resulting in premature belt failure.
- Unmatched belts may increase belt whip and vibration

When Replacing Sets of V-Belts
- Always replace with the right type of v-belt for the application
- Never mix new and used belts on a drive
- Never mix belts from different manufacturers:
  - Belts cannot be matched and will not deliver the service life they should
  - The dimensions of belts from different manufacturers will vary
  - Construction differences may cause belts to ride differently in the sheaves and stretch differently
  - Belts may seat in the sheave differently
- Problems that appear to be caused by belts that are not matched may be due to other causes such as misalignment and sheave wear

Chek Mate icon ensures matched belts

GOLD-RIBBON® COG-BELT®

The Timken team applies their know-how to improve the reliability and performance of machinery in diverse markets worldwide. The company designs, makes and markets high-performance mechanical components, including bearings, belts, gears, chain, couplings and related mechanical power transmission products and services.