



## Case Study

### Outstanding results with TeraSpin drafting system – Shameem Spinning Mills, Bangladesh

#### Background

Shameem Spinning Mills, Bangladesh, is one of the largest enterprises of the Jamuna Group, a 3 decade old organisation having diverse business interests in electrical engineering, chemical, leather, garments and textiles – including spinning, knitting and dyeing, cosmetics, toiletries, beverages, real estate, housing, print and electronic media sectors! Naturally, the Jamuna Group's spinning mill is a high efficiency unit, always upgrading its equipment and processes. Shameem is a modern yarn spinning mill which produces 24,000 kg/day of yarn with latest plant and machinery and advanced testing equipment to ensure the highest standard of quality and productivity. Their product range includes cotton, mélange, and blended yarns.

#### Challenge

The Jamuna Group's spinning mill is a high efficiency unit, always upgrading its equipment and processes. Shameem is a modern yarn spinning mill which produces 24,000 kg/day of yarn with latest plant and machinery and advanced testing equipment to ensure the highest standard of quality and productivity. Their product range includes cotton, mélange, and blended yarns. Shameem's state-of-the-art facility at Bangladesh is mostly equipped with Chinese preparatory machines. It has 49,920 spindles (104 frames x 480 spindles) of ring spinning machines of Chinese Jingwei FA 506 make and 2,160 spindles (18 frames x 120 spindles) of roving machines, also of Jingwei make.

#### Solution

With an aim of getting an improved productivity and reduced yarn imperfections, Shameem accepted TeraSpin's proposal to test run its PK 2025 drafting system. The initial trial reports showed 9 to 50% improvement in IPI (yarn imperfections). Encouraged by the outstanding results, Shameem decided to upgrade its entire lot of 49,920 ring spinning spindles and 2,160 roving frame spindles with TeraSpin components.

The modernisation package included:

- Replacement of existing spindles with new TeraSpin spindles with HF1 inserts
- Replacement of existing weighting arms on ring frames with TeraSpin PK 2025 drafting with Smart cradle
- Replacement of existing weighting arms on roving frames with TeraSpin PK 1500 drafting

#### Results

The improvements in operations achieved were:

1. 10% increase in spindle speed, while keeping the end breakage rate the same
2. Reduction of yarn imperfections
3. Higher productivity per kW of energy

Shameem is very happy with the results – improvements in productivity, efficiency and quality; all at a fraction of the cost of investing in new machines. TeraSpin is proud to be part of Shameem's modernisation project!



PK 1500

PK 2025