number of defects and does not require frequent interference of the cleaning device nor considerable improvement in its quality. In the case of blended yarn, an increased number of neps and thin places required a higher number of cleaning cuts to improve its quality [6, 12].

The use of a thermosplicer does not translate into an increase in yarn strength after rewinding. The yarn strength depends of the number of defects, joint frequency and settings of the rewinding process [16].

Yarn joints made by the use of a thermosplicer have a higher tenacity, lower variability coefficient of the tenacity and higher relative elongation at break than those made with the use of a standard splicer.

The highest tenacity of the wool yarn joint is noted for variant W1 and of the blended yarn for variant W2. Variants W1 and W2 are yarns rewound at the standard settings recommended by the manufacturer of the winding frame (joining time – 260 ms). This indicates that these settings are optimal for worsted and blended yarns. For cotton yarns, the setting of a longer joining time (300 ms) is more advantageous, as confirmed during previous tests [11]. It was the manufacturer's recommendation to set 260 ms as the joining time, which means that for yarns made of various types of fibres with different structures, the settings in the rewinding frame chamber should be established individually on the basis of one's own production experience.

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