



JTEKT INSIDE - August 2022



Introduction

JTEKT Bearings (formerly Koyo Bearings) continues its relentless efforts to optimize its products for very specific applications inside demanding industries and for professional leisure markets. Recently a new ceramic bearing for race bicycles was developed.

The challenge

Customers continuously ask us to provide even better bearings for the wheels of race bicycles with reduced rotation friction but without compromising the strength and durability. With a long history of developing ceramic bearings for various demanding applications, JTEKT used its long experience in this field and managed to develop a unique bearing to meet exactly those demands.



The Results

1. Spectacular reduction of rotating torque.

With the newly developed ceramic bearing for race bicycle wheel application, which we branded the "ONI bearing", we could strongly reduce the rolling resistance compared to our previous design and another reputable reference brand (standard version and coated version) as can be seen in figure 1.

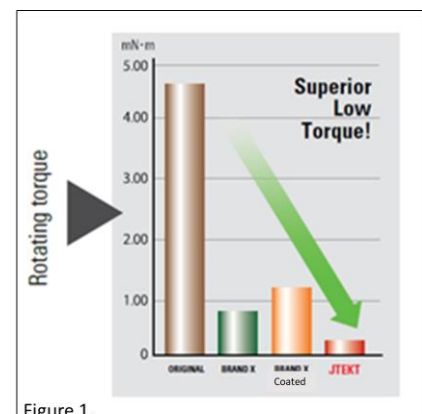
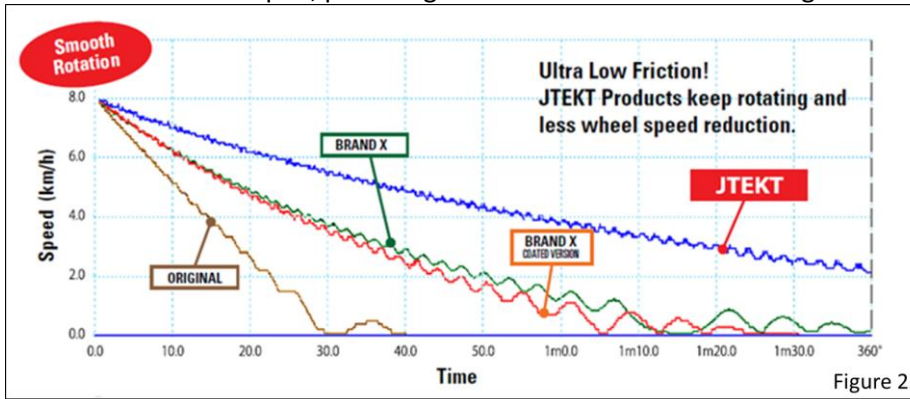


Figure 1.

2. A strong reduction in wheel speed deceleration.

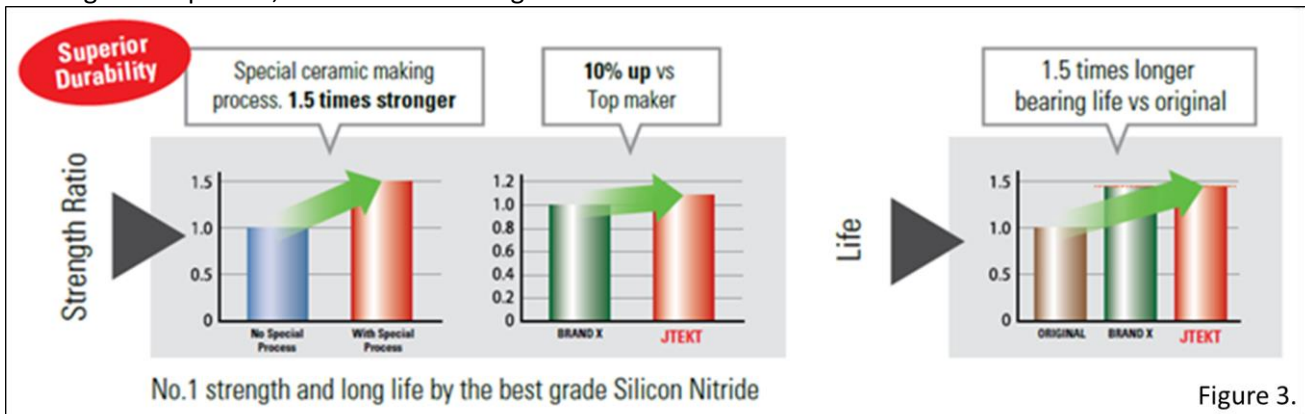
The best evidence of the superior performance could be demonstrated on a wheel speed deceleration test bench that we developed, providing the results as can be seen in figure 2.



The actual bench test can be seen “live” on a Youtube video, that can be reached via the QR-code link.

3. Increased strength ratio and increased bearing life

As a pleasant side effect of this new developed bearing, also both the strength and the bearing life of the ONI bearing was improved, as can be seen in figure 3.



The ultimate achievement

Our ceramic ONI bearing helped the world champion to win the golden medal at the Tokyo Omnium cycle track race.

General notification

Koyo Bearings has been officially rebranded to **JTEKT Bearings** as of April 1, 2022. Please appreciate that this is only a change of brand. The company, its general structure, the products and services will remain the same. Our customers can rely on the continued good service and quality of our products in the future and our commitment to keep the same excellent business relationship with our valued partners, as in the past.

Please do not hesitate to contact us or your distributor in case you would like to have more information about our company, products and services.



Get to know our bearings at www.koyo.eu

