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› NOVA Ride OSPW R9200/R8100 Full Ceramic Bearing Pulley System Instruction Manual

NOVA RIDE OSPW R9200/R8100

NOVA Ride OSPW R9200/R8100 Black Full Ceramic Bearing Pulley System

Instruction Manual

1. PRODUCT OVERVIEW

The NOVA Ride OSPW (Oversized Pulley Wheel) system is an advanced component designed to optimize the performance of your bicycle's drivetrain. It features larger pulley wheels and ceramic bearings to reduce friction and improve power transfer. This system is engineered for specific Shimano road bike groupsets, enhancing shifting efficiency and durability.



Image 1.1: The NOVA Ride OSPW system, featuring a carbon cage and oversized black pulley wheels.

2. COMPATIBILITY

This NOVA Ride OSPW system is specifically designed for compatibility with the following Shimano road bicycle groupsets:

- SHIMANO ULTEGRA R8100-8150Di2 series
- SHIMANO DURA ACE 9200-9250Di2 series

Ensure your bicycle's groupset matches one of the listed compatible series before attempting installation.

3. KEY FEATURES

The NOVA Ride OSPW system incorporates several key features designed for optimal performance and durability:

- **3K Carbon Cage:** Lightweight and rigid carbon fiber construction for enhanced power transfer and reduced flex.
- **Full Ceramic Bearings:** High-precision ceramic bearings minimize friction, leading to smoother operation and increased efficiency.
- **7075 Aluminum Pulley Wheels:** Durable 14-tooth (upper) and 17-tooth (lower) aluminum pulley wheels designed for longevity and precise chain guidance.
- **Optimized Weight:** The system weighs approximately 68 grams (2.6 oz), contributing minimally to overall bike weight.
- **Maximum Sprocket Compatibility:** Supports rear cassettes with a maximum sprocket size of 34 teeth.

4. SETUP AND INSTALLATION

IMPORTANT SAFETY NOTICE: Installation of the NOVA Ride OSPW system requires professional knowledge and specialized tools. Failure to perform the installation correctly may lead to unexpected accidents, damage to your bicycle, or personal injury. It is strongly recommended that installation be performed by a qualified bicycle mechanic or a professional bicycle seller.

While professional installation is advised, the general steps involved in replacing a standard derailleur cage with an OSPW system typically include:

1. **Preparation:** Ensure your bicycle is securely mounted in a repair stand. Shift the chain to the smallest cog and remove tension from the chain.
2. **Derailleur Removal (Partial):** Carefully remove the existing derailleur cage and pulley wheels from the rear derailleur body. This often involves unscrewing a pivot bolt.
3. **OSPW Installation:** Attach the NOVA Ride OSPW carbon cage to the derailleur body, ensuring proper alignment and torque specifications are met for all bolts.
4. **Chain Length Adjustment:** An OSPW system may require a longer chain due to the larger pulley wheels. It is crucial to verify and adjust chain length to prevent drivetrain damage.
5. **Indexing and Adjustment:** Perform precise derailleur indexing and limit screw adjustments to ensure smooth and accurate shifting across all gears.
6. **Final Check:** Test shifting thoroughly in all gears, both on the stand and during a short test ride, to confirm proper function and safety.

Refer to the specific instructions provided with your derailleur and the OSPW system for detailed torque specifications and installation procedures.

5. OPERATING INSTRUCTIONS

Once properly installed, the NOVA Ride OSPW system operates seamlessly as part of your bicycle's drivetrain. Its primary function is to guide the chain smoothly and efficiently through the rear derailleur. No special operating procedures are required beyond standard bicycle shifting practices.

- **Shifting:** Continue to shift gears as you normally would, using your bicycle's shifters. The OSPW system is designed to enhance the smoothness and precision of these shifts.
- **Chain Management:** Be mindful of chain cross-chaining (e.g., big chainring to big cog, or small chainring to small cog) as this can put undue stress on the drivetrain components, including the OSPW.

6. MAINTENANCE

Regular maintenance is crucial to ensure the longevity and optimal performance of your NOVA Ride OSPW system:

- **Cleaning:** Periodically clean the pulley wheels and the carbon cage to remove accumulated dirt, grime, and old lubricant. Use a degreaser specifically designed for bicycle components, followed by a rinse and dry.
- **Lubrication:** Apply a small amount of high-quality bicycle chain lubricant to the ceramic bearings of the pulley wheels. Avoid over-lubricating, as this can attract more dirt.
- **Inspection:** Regularly inspect the pulley wheels for wear, damage, or excessive play. Check the carbon cage for any cracks or signs of stress. Ensure all bolts are securely tightened to their recommended torque specifications.
- **Professional Service:** Consider having your OSPW system and entire drivetrain inspected by a professional bicycle mechanic at least once a year, or more frequently if you ride in harsh conditions.

7. TROUBLESHOOTING

If you experience issues with your drivetrain after installing the OSPW system, consider the following common troubleshooting steps:

- **Noisy Drivetrain:**
 - Check for proper lubrication of the chain and pulley bearings.
 - Ensure the chain length is correct for the OSPW system.
 - Verify derailleur indexing and limit screw adjustments.
 - Inspect pulley wheels for wear or damage.
- **Poor Shifting Performance:**
 - Re-check derailleur indexing and cable tension.
 - Confirm that the OSPW system is correctly installed and aligned.
 - Ensure the chain is clean and adequately lubricated.
- **Excessive Play in Pulley Wheels:**
 - This may indicate worn bearings or loose bolts. Inspect and replace components as necessary, or seek professional assistance.

For persistent issues, it is highly recommended to consult a professional bicycle mechanic.

8. SPECIFICATIONS

Attribute	Value
Brand	NOVA RIDE
Model Compatibility	SHIMANO ULTEGRA R8100-8150Di2, DURA ACE 9200-9250Di2
Cage Material	3K Carbon
Bearing Type	Full Ceramic
Pulley Material	7075 Aluminum
Pulley Teeth Count	14T (Upper) / 17T (Lower)
Weight	68 grams (2.6 oz)
Maximum Cassette Sprocket	34T
Color	Black
Item Package Dimensions (L x W x H)	7.36 x 4.49 x 2.36 inches
Package Weight	0.25 Kilograms
Mounting Type	Braze-On Mount (Derailleur specific)

9. WARRANTY AND SUPPORT

For information regarding warranty coverage, returns, or technical support for your NOVA Ride OSPW system, please contact the retailer from whom you purchased the product or visit the official NOVA Ride website. Keep your proof of purchase for any warranty claims.

For further assistance or detailed technical inquiries, it is recommended to consult with a certified bicycle mechanic.

Ask a question about this manual

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