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DZERO Level 3 DAQ/Trigger Closeout

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The Tevatron Collider, located at the Fermi National Accelerator Laboratory, delivered its last 1.96 TeV proton-antiproton collisions on September 30th, 2011. The DZERO experiment continues to take cosmic data for final alignment for several more months. Since Run 2 started, in March 2001, all DZERO data has been collected by the DZERO Level 3 Trigger/DAQ System. The system is a modern, networked, commodity hardware trigger and data acquisition system based around a large central switch with about 60 front ends and 200 trigger computers. DZERO front end crates are VME based. Single Board Computer interfaces between detector data on VME and the network transport for the DAQ system. Event flow is controlled by the Routing Master which can steer events to clusters of farm nodes based on the low level trigger bits that fired. The farm nodes are multi-core commodity computer boxes, without special hardware, that run isolated software to make the final Level 3 trigger decision. Passed events are transferred to the DZERO online system. We will report on the final status and state of the system, along with some of the more interesting milestones throughout its history.

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