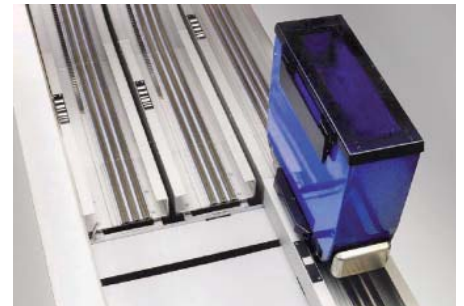


# CASESTUDY

BCI-motors  
Industrial automation  
November 2008

## Motor dynamics for smooth direction change Transport systems with individual conveying systems

For company-internal material conveying systems, operating reliability, speed, and versatility belong to the most important requirements. Modern rail systems in modular form provide the fast and flexible ability to adapt to various needs.



### Technical data

In order to let the individual transport containers arrive safely at their destination, DC motors of the BCI 42.25 series ensure that the track switches at the transfer stations are controlled reliably. The 17 W motors have a diameter of 42 mm and, with a 24V supply voltage, achieve a rated torque of 38 mNm. An extremely flat spur gear unit with integrated installation holes for fast onsite installation provides speed reduction. With a reduction of  $i=110:1$ , a torque of 2.6 Nm is achieved at a nominal speed of 30 rpm at the gear output. Furthermore, the motor can supply, in both directions, several times the nominal torque for start-up torque. This ensures constant and sufficient torque for adjusting track switches reliably, on demand, and around the clock. And this not only over many years of system operation and over 1 mill. switching cycles, but even under changing ambient conditions.