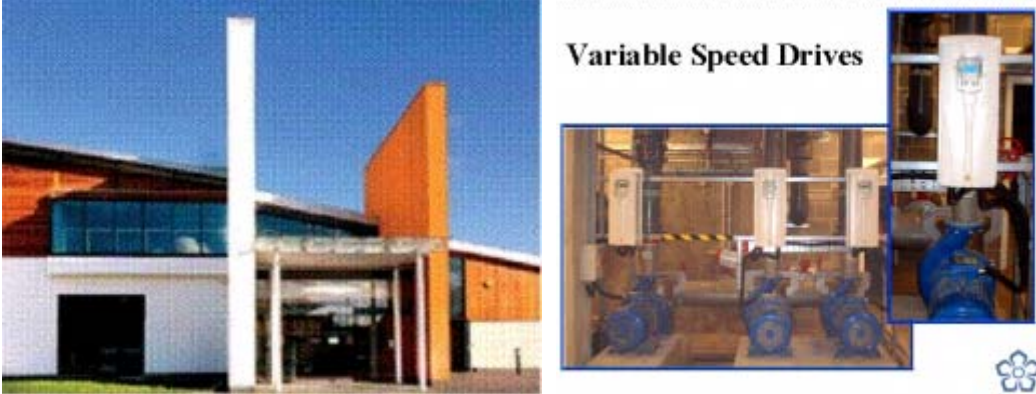


Installation of Variable Speed Drives - Leicester, United Kingdom	
Keywords	Energy Savings, Leisure Centre, Community Swimming Pool, Installation of Variable Speed Drives to Control Water Circulation
Pictures	
Objectives	To reduce the electricity consumed by the swimming pool pumps through the introduction of variable speed drives to vary the motor speed according to demand.
Description	<p>Leicester City Council has some very ambitious environmental commitments to reduce energy and water use in its buildings. The Council is committed to halving the amount of energy it was using in 1990 by 2025 and aims to get 20% of all its energy from renewable systems by 2020. For many years Leicester City Council has played an active role in encouraging and supporting measures that protect the environment. This was recognised in 1990, when Leicester became Britain's first 'Environment City'. Leicester City Council has since adopted a number of 'green' policies, ensuring that its own services and activities meet the high standards it encourages others to adopt.</p> <p>Braunstone Leisure Centre was opened on Monday, 6th December 2004. The Centre includes two community swimming pools - a main pool and a teaching pool. An energy survey of the motors that drive pumps and fans within the Leisure Centre was carried in June 2005. The survey found that swimming pool motors would normally run flat out for at least 15 hours a day, 7 days a week consuming increasingly expensive electricity.</p> <p>Consequently, the use of variable speed drives to control the poolwater circulation pumps was investigated. This energy efficiency measure would allow the Leisure Centre to slow down or speed up the motors according to demand, rather than running them constantly, at full power. It was decided that variable speed drives should be installed, and this took place in August 2005.</p>
Results / Achievements	The variable speed drives have contributed to reducing CO ₂ emissions through the reduction in electricity consumed. In the first year, 240,000 kWh of electricity was saved. No measurable impact on the water quality in the swimming pool was found.
Online information	http://www.display-campaign.org/rubrique675.html
Contact	Prakash PATEL Leicester City Council Tel: +44 (0)116 299 5142 E-mail: Prakash.Patel@leicester.gov.uk Website: www.leicester.gov.uk , www.carbontrust.co.uk , www.intelmeter.com