

Report Date: May 25, 2012

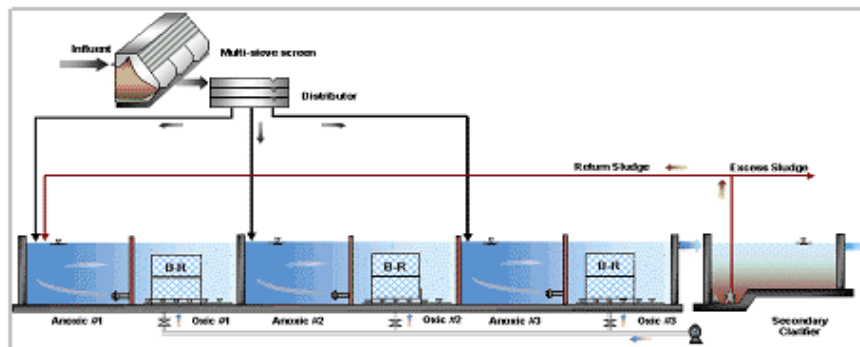
## GENERAL INFORMATION

Product: Pulsarlube M 125cc/PL1  
Industry: Wastewater Treatment Facility  
Customer: KOLON Water & Energy  
Application: Electric Motors (Compression & Dehydration)  
Installed on: Mid-August, 2010

## BACKGROUND

KOLON Water & Energy provides a complete Wastewater Management service in Korea. Estimated potential of total 11 facilities would be over 400 lube points for Pulsarlube M units.

This facility is dedicated for LG-Philips LCD plant and has a capacity of 70k m<sup>3</sup>/day. There are total 50 lube points available for Pulsarlube M. The Maintenance engineer has decided to try Pulsarlube M 125cc units for 11 sets of high power electric motors in compression process (7 sets) and dehydration process (4 sets).



Bio-Sac MS-BNR Wastewater treatment process using 3 step aerated basin

## INSTALLATION INFORMATION

**Before installation:** All electric motors have been manually lubricated without confidence and over-lubrication has been major concerns in motor maintenance.

**After installation:** Total 22 units of the Pulsarlube M 125cc filled with PL1 installed for high power electric motors as follows. Dispensing period is set at 12 month to avoid possible over-lubrication.



14 units of Pulsarlube M 125cc installed in Compression process



**8 units of Pulsarlube M 125cc installed in Dehydration process**

## SUMMARY

As of May 2012, all units have been still working well after 3rd replacement of service pack. The maintenance engineer is satisfied with the performance of the units so far. However, due to uneven operating time of backup motors, he still has a concern about possible over-lubrication.

From April 2012, a trial of new MI 60 (Intelligent Vibration Detecting Pulsarlube M 60cc) unit is ongoing to confirm the right amount of relubrication vs. uneven operating time by detecting the vibration of operating motors.

The details of trial would be available in the 3<sup>rd</sup> quarter of year 2012, which would be a key factor for further expansion of the use of Pulsarlube M (or MI) at other facilities.

End of report