

Case Study

Empowering Expansion:

How Lead-Go Enterprise worked with Rehlko to transform Taiwan Tong Luo Wastewater Treatment Plant's power capacity





Customer

Taiwan Government & Hsinchu Science Park Bureau



Power Generator

KD2800-UE Tier II 2500kW/3125kVA



Contractor

Leading Engineering Company



Scope of Supply

Installation of the fuel system, daily tank, exhaust system, heat ventilation system

Overview

As the contractor overseeing Tong Luo Wastewater Treatment Plant, Leading Engineering Company encountered an issue when the treatment plant recently expanded its operations to pump and purify 18,000 tons of wastewater.

Due to this increased workload, the two existing onsite generators, with a combined power capacity of 1200kW, could not meet this elevated demand for backup power supply. As a result, the company tapped on Lead-Go's expertise in the field of generators to provide a reliable solution for this turnkey project.

In partnership with Rehlko, Lead-Go was able to provide Leading Engineering Company with a comprehensive turnkey solution package. Beyond supplying the power generator, the package consists of the installation of the fuel system, daily tank, exhaust system, heat ventilation system, and soot filter system.

This solution helped ease power disruption concerns within Tong Luo Wastewater Treatment Plant and enabled seamless, continued operations, thus securing the project for Lead–Go.



Challenge:

Providing Reliable Backup Power to Meet Increased Energy Demand

Tong Luo Wastewater Treatment Plant serves a crucial role within the Science Park, distinguishing itself by not only purifying general wastewater but also industrial wastewater, which is often characterized by high electrical conductivity ions

To improve existing facilities, enhance their functions, and maintain stable operation of the existing sewage plants, Leading Engineering Company was contracted to strengthen this modern wastewater treatment demonstration plant that offers high efficiency, energy–saving, stability, reliability, and convenient operation.

In addition, the company must ensure that the discharged water from the plant meets

environmental impact assessment commitments to prevent any potential water pollution in the surrounding environment. That is especially important, as the downstream end of the discharge pipe is located near farmlands.

As part of the project, Leading Engineering Company has expanded the plant's operation by adding additional pumps to treat and discharge 18,000 tons of wastewater – up from its initial load of 12,000 tons. However, this increased workload demands more energy than the existing generators onsite, featuring a power capacity of 1000kW and 200kW, respectively, are capable of producing.



Founded in 1989, Lead–Go Enterprise quickly established itself in the industry by becoming the official Taiwan distributor for Rehlko by 1990. Committed to pursuing high quality, timely delivery, and cost–effectiveness, continually enhancing the overall development and expansion of its business, thereby securing a prominent position in this industry. Lead–Go operates with a business ethos characterized by professionalism, friendliness, efficiency, passion, and creativity and aims to provide the highest quality services while integrating market resources to achieve sustainable development.

Solution:

Add Expanding Power Supply With A Reliable,

More Powerful Generator

The Engineering Company sought a vendor that could provide a turnkey solution package to address its need for a reliable backup power supply capable of meeting the demand of its operations. As a result, the company turned to Lead–Go, a dynamic force in the field of generators, due to its extensive experience in the industry and its familiarity with generators and paralleling systems.

By working with Rehlko, Lead-Go was able to provide the ideal turnkey solution package for this project. In addition to the <u>KD2800-UE prime-rated generator</u>, featuring an energy rating of 2500kW, more than double the current power capacity offered by the two existing gensets at Tong Luo Wastewater Treatment Plant, the package includes the installation of the fuel system, daily tank, exhaust system, heat ventilation system, and soot filter system.

Additionally, the KD2800 generator features a Tier II emission, which mitigates the amount of Nitrogen Oxides (Nox), Hydrocarbons (HC), Diesel Particulate Matter (DPM), and Nitrogen Oxides (Nox) it emits, reducing the impact on the environment. The soot filter system is also specifically designed to ensure black soot opacity of no more than 40% in three minutes, complying with the local environmental standard.





Results:

Lead-Go Was Awarded The Project By Leading Engineering

Due to Lead-Go's capability to provide a comprehensive one-stop solution package to meet the diverse needs of Leading Engineering Company and its extended standby warranty coverage, as well as the shorter lead terms and better warranty offered by Rehlko's generators, Lead-Go was awarded the project by Leading Engineering Company.

This case study is just a sample of what our generators can offer businesses in various industries. <u>Visit our website today</u> to explore customized power solutions that drive efficiency, cost savings, and operational excellence.