冠軍方案:加強機場跑道燈保養

Champion Solution: Airport Runway Lighting Maintenance Enhanced

作 修安裝於跑道和滑行道上的跑道燈,往往需要在戶外實地進行,相關工作易受天氣及跑道交通情況影響,工作效率受阻。有見及此,負責維修保養工作的機電工程署團隊,研發了名為「室內固定電流調節器測試平台」的創新方案,以實踐我們持續改善服務的承諾。這個特別設計的平台,讓工作人員能在不受天氣及跑道交通限制的情況下,於室內進行日常維護工作,大大減低了天氣和交通情況對維修跑道燈工作的限制。

香港國際機場是世界最繁忙的機場之一。機場現有兩條跑道和12條滑行道,總長度超過25公里,沿跑道和滑行道裝置了逾一萬盞跑道燈,每天24小時運作,並由212個室內跑道燈固定電流調節器操作及監控。為確保機場的安全和持續運作,跑道燈的維修保養至為重要。

「室內固定電流調節器測試平台」,讓我們可以更緊密地於室內進行維護工作,不但 提升了跑道燈系統的可靠性,日常的航班 升降亦不受影響。



「固定電流調節器測試平台」,使跑道燈系統的維修保養 工作可於室內進行。

Maintenance work of the runway lighting system can be carried out indoor using the CCRs Testing Platform.

這個優秀的改善個案贏得機電工程署「2012年最佳改善個案比賽」冠軍,體現了機電工程署的核心使命 — 為客戶提供優質的工程方案,以滿足客戶需要。而機場管理局對此工程方案,亦予肯定及提供所需資金。最佳改善個案比賽源於機電工程署於1991年開展的「工作改善小組計劃」。二十年來,獲獎的優秀個案超過40個,為多個政府部門和公共機構帶來更優質的服務。



「2012年最佳改善個案比賽」冠軍團隊。

The Best Improvement Project Competition 2012 champion team.

Maintenance of airfield lights along the airport runways and taxiways requires considerable outdoor fieldwork which is susceptible to weather and runway traffic conditions, thus affecting operational efficiency. To overcome this hurdle and as part of our commitment to continuous service improvement, an innovative solution called the "Indoor Constant Current Regulators (CCRs) Testing Platform" is developed by a team of EMSD colleagues. This innovative solution enables the team to conduct regular preventive maintenance indoors on a specially designed platform, thus reducing the constraints of weather and runway traffic condition on airfield light maintenance work.

The Hong Kong International Airport is one of the world's busiest airports. The total length of its two runways and 12 taxiways exceeds 25km. More than 10,000 airfield lights, running 24 hours a day, are installed along the runways and taxiways. All the airfield lights are controlled and monitored by 212 indoor CCRs. To ensure the safe and

continuous operation of the Airport, maintenance of these lights is of critical importance.

The "Indoor CCRs Testing Platform" enables the team to conduct preventive maintenance work indoors more regularly. As a result, reliability of the runway lighting system has been enhanced while daily flight movements are not affected.

This outstanding project, which won the championship of the EMSD "Best Improvement Project Competition 2012", demonstrates EMSD's core mission in providing quality engineering solutions to satisfy customer needs. The Airport Authority not only gave recognition to our effort but also funded this improvement project. The "Best Improvement Project Competition" is part of EMSD's "Work Improvement Team Scheme", which started in 1991. More than 40 outstanding projects were awarded in the past two decades, bringing enhanced service to various government departments and public bodies.