

# CASE STUDY ETHIOPIA SEMERA AIRPORT

## PROJECT KEY FACTS

**Airport:** Semera Airport

**Location:** Ethiopia

**Application:** Regional Airport

**Runway:** 2 500 m x 45 m

**Solution:** Permanent Solar Runway Lighting

**Products:** Solar Approach Lights, Solar Runway Edge Lights, Solar Threshold Lights, Solar Runway End Lights, Solar Taxiway Lights, Solar Turning Pad Lights, ALCMS Advanced, UR-201 Control & Monitoring Unit, OCT-401 Charger, UR-1 Wireless Controller

**Customer:** Ethiopian Airlines

**Year of Installation:** 2021



## OVERVIEW

S4GA supplied Solar Airfield Lighting System to Semera Airport in Ethiopia. The solution is used at the Ethiopian Airport on a permanent basis. It is for the second time that Ethiopian Airlines – the Airport Operator, decided to go solar with S4GA runway lighting for its projects.

## CHALLENGE

The main challenge for the Airport in choosing AFL was to get around the problem of unreliable electrical power supply in the region – which bring a high risk of a blackout scenario. The expensive and time-consuming installation of airfield lighting was another challenge that had to be solved. After careful examination of the Airport's requirements, it was obvious that conventional wired runway lighting wouldn't meet any of them. At that point, the Airport's Authority started looking for alternative solutions.

## SOLUTION

Among key factors that pointed to S4GA as the best fit for the Semera Airport, should be mentioned:

- Good experience with S4GA – in 2018 Ethiopian Airlines acquired S4GA Solar Runway Lighting for its other airport located in Jijiga.
- Airfield lighting operates 365 days a year on solar energy solely – no need for an electrical power supply
- Low Investment – S4GA Solar system cost is 30% lower compared to conventional airfield lighting
- Fast project implementation
- Only minimum maintenance which takes less than 1% of the AGL system's total cost
- Compliance with international aviation standards such as ICAO, FAA, NATO STANAG



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**S4GA PRODUCTS**



**SOLAR APPROACH LIGHT**



**SOLAR RUNWAY EDGE LIGHT W/W**



**SOLAR RUNWAY EDGE LIGHT W/Y**



**SOLAR RUNWAY THRESHOLD LIGHT**



**SOLAR RUNWAY END LIGHT**



**SOLAR TAXIWAY LIGHT**



**SOLAR TURNING PAD LIGHT**



**OCT-401 CHARGER**



**ALCMS CONTROL & MONITORING SYSTEM ADVANCED**



**UR-201 CONTROL & MONITORING UNIT**



**UR-1 WIRELESS CONTROLLER**

**APPLICATION PHOTOS**

