

### Helicopter Landing Solutions for Humanitarian, HEMS and Border Control operations FEC Heliports

Vertical take-off and landing (VTOL) technology is unmatched in its ability to access the most remote areas, transport necessities quickly and evacuate injured people. It is in such emergency situations, where lives are at stake, that the helicopter comes into its own.

FEC Heliports feel great pride at being able to help helicopter operations through our innovative range of products that improve safety at ad hoc and permanent Helicopter Landing Sites (HLS).

In order to support its partner operators, FEC Heliports has developed a range of portable helicopter landing systems and other strategic equipment designed for rapid deployment to enhance helicopter landing safety and provide effective marking at designated or ad-hoc helicopter landing areas.

FEC Heliports product range, as described below, provides a cost-effective approach, shapes the most realistic and technically high-scoring offer while keeping safety as a number one priority. The success of the humanitarian, HEMS and Border Control operations consulting approach has already been seen in Central African Republic, Mali, Papua New Guinea, United States of America, United Kingdom and various other countries worldwide often in demanding yet highly visible environments.

## FEC Heliports Portable Helipad (Portapad) Border Control (USA - US Customs and Border Protection)

The Portapad solution provides a low maintenance and costeffective network opportunity for Customs and Border Control agencies, HEMS, Police, Aerial Fire-fighting and other services.

Portagonal is used by the **US Customs and Border Protection** at a network of **15 remote locations**.

Our industry-leading products combine to form a portable 24/7 helicopter landing system. FEC Heliports family of products are designed to integrate seamlessly.

## A strong, safe, reusable, and portable helicopter landing platform for unprepared areas

- Cost-effective with low relocation costs.
- Significantly reduces brownout and increases protection from Foreign Object Debris (FOD).
- Reliable Aluminium platform adds to helicopter landing safety.
- Virtually maintenance-free all parts are constructed of non-corrosive alloy or stainless steel.







# FEC Heliports Portable Helipad (Portapad) Morobe Mining - Wafi-Golpu Joint Venture (WGJV) – Medivac – Papua New Guinea

FEC Heliports supplied two (2) Portapads to the Wafi-Golpu Project in Papua New Guinea predominately for worker/ supplies transportation and Medivac to and from remote locations.

### A successful medivac at the Wafi-Golpu Project sites has saved the life of a mother and child.

Lupito Russell, 24, from Bavaga Village started labour contractions on July 24, and three days later she was rushed to the Wafi Health Subcenter in a life-threatening situation.

Wafi-Golpu Joint Venture's Health Extension Officer, Philip Dulau, and the clinic's Community Health Worker (CHW), Robert Kitumga, assessed the condition and identified that the mother and baby were in danger due to the complication and immediately raised the alarm.

Mr Dulau with quick assistance from WGJV's community affairs and, emergency response contacted Manolos, the helicopter company contracted by the Morobe Provincial Government to conduct medevac in rural areas of the province.

Lupito was airlifted from the WGJV camp which has a *FEC Heliports Portable Helipad* in situ, to ANGAU Memorial General Hospital, where she was admitted. Under the professional care of the ANGAU medical staff, Lupito delivered a healthy baby boy on July 27.

Mr Kitumga thanked WGJV for their assistance, use of the **FEC Heliports Portapad** system and Morobe Provincial Government for the medevac program, which has saved many lives since its inception.





FEC Heliports - MIL-Star®/ HEMS-Star®: Portable Tactical Airfield Lighting System with NVG compatible IR

United Nations (UN) Multidimensional Integrated Stabilization Mission in Mali

**Humanitarian – Peace Keeping** 

FEC Heliports provides 18 Cases of MIL-Star® Portable Tactical Airfield Lighting System with NVG compatible IR

The United Nations Multidimensional Integrated Stabilization Mission in Mali is a United Nations peacekeeping mission in Mali. MINUSMA was established on 25 April 2013 by United Nations Security Council Resolution 2100 to stabilise the country after the Tuareg rebellion of 2012. It was officially deployed on 1 July, and regrettably has become the UN's most dangerous peacekeeping mission, with 204 peacekeepers killed out of a force of about 15,000.

MINUSMA has 23 no Rotary Wing Air assets deployed throughout the Mali region.

MIL-Star® rechargeable battery powered LED helipad lighting system is designed for fast deployment and use by advancing military forces in temporary and emergency situations.

The MIL-Star® system provides safe and effective marking at designated an ad-hoc helicopter landing zones across the fleet of rotary aircraft serving in MALI.

The MIL-Star® contributes to humanitarian and peace-keeping efforts of the **UN** mission forces by improving night operations marking of helicopter landing zones that can be identified at night from distances up to 10 Miles (16km).

MIL-Star® are pilot activation enabled and can be controlled via the aircraft PTT (VHF Radio) Air to Ground control operational at line-of-sight ranges in excess of 10km.





### **HEMS Station® Solar Plus**

### Scotland (United Kingdom) – Scottish Ambulance Service – Secondary Landing Sites

<u>HEMS Station\* Solar Plus</u> installed for use by SASAA and Search & Rescue Operations in the surrounding area, as a designated secondary landing site, for day and night operations.

- Supports Extended Operating Hours
- Improved Regional Coverage in Low-Visibility/Night Ops
- Reliable Lighting Solution with Remote SMS System Monitoring
- Low Maintenance and Support Required
- Faster Response Times to Nearest Trauma Unit
- Ultimately, Supports Extended Patient Care



Glenforsa, Isle of Mull, Scotland, UK

"The Scottish Ambulance Service uses Glenforsa Airfield on Mull as a landing site for its helicopters 24hrs a day and undertakes in the region of 60 transfers per year from there. In February 2018 in order to improve our responsiveness and resilience FEC Heliports installed a HEMS Station at the airfield. The features of the HEMS Station allow us to ensure that the HEMS Star lights are continually charged using solar power. The status of the lights can be checked by SMS texts, whenever required, and hence are always ready to be deployed when required.

In the 6 months of operations, at Glenforsa, we have had no issues with the installation and have received excellent customer service and support from FEC."

Rob Dalziel, SRP Regional Air Ambulance Manager





FEC Heliports PAD Star® Solar Plus Helipad Lighting System

East Anglia Air Ambulance (EAAA) - Addenbrookes Hospital Helipad - United Kingdom (UK)

**Helicopter Emergency Medical Services** 

#### **Application:**

PAD Star® Solar Plus installed for use by EAAA and Air Ambulances in the surrounding regions, upgrading the existing helipad lighting system and providing a reliable, fully supported solution to maintain extended day and night operational hours.

#### Location:

Addenbrookes Hospital, Cambridge, UK

#### **Benefits:**

- Entirely Solar Powered System (Fully autonomous)
- Includes 18' Internally Illuminated LED Wind Cone with Inbuilt Dusk to Dawn Obs. Light
- Secure IP65 Rated Cabinet Housing for Manual/UHF Controllable Lighting Control Unit
- VHF Air-to-Ground Remote Controlled from Aircraft at over 10km (Line of Sight)
- Low Maintenance and Remote Support Capability via UHF
- SMS Connectivity and System Monitoring Available
- Quick to Install Fully Installed, Tested and Operational within a Week
- PAD-Star®: FEC Heliports Latest Generation of Wired LED Helipad Lighting solutions

"The East Anglian Air Ambulance (EAAA) needed an urgent replacement for the lighting system at our region's major regional trauma unit; Addenbrookes hospital when the existing system failed. The FEC Heliports solar powered option was ideally suited to the site and in a number of ways represented a step up from the old system with no reliance on the hospital infrastructure and services and with reliable on-call backup from FEC Heliports. It was quick to install and test and was on-line in a matter of weeks from our initial order. The company has been responsive and flexible to our needs and we are looking forward to developing more helipad lighting solutions with them in the future.""

Alan Ward - Aviation Advisor East Anglia Air Ambulance







FEC Heliports MIL-Star® Portable Tactical Airfield Lighting System with NVG compatible IR

The United Nations Multidimensional Integrated Stabilization Mission in the Central African Republic (MINUSCA)

**Humanitarian – Peace Keeping** 

FEC Heliports provides 12 Cases of MIL-Star® Portable Tactical Airfield Lighting System with NVG compatible IR

The United Nations Multidimensional Integrated Stabilization Mission in the Central African Republic (MINUSCA)

Mandated to protect civilians and support transition processes in the Central African Republic Concerned with the security, humanitarian, human rights and political crisis in the Central African Republic and its regional implications, the Security Council authorized on 10 April 2014 deployment of a multidimensional United Nations peacekeeping operation – MINUSCA – with the protection of civilians as its utmost priority. Its other initial tasks included support for the transition process; facilitating humanitarian assistance; promotion and protection of human rights; support for justice and the rule of law; and disarmament, demobilization, reintegration and repatriation processes.

**MINUsca** has 7 no Rotary Wing Air assets deployed throughout the Central African Republic **(CAR)** region.

MIL-Star® rechargeable battery powered LED helipad lighting system is designed for fast deployment and use by advancing military forces in temporary and emergency situations.

The MIL-Star® system provides safe and effective marking at designated ad-hoc helicopter landing zones across the fleet of rotary aircraft serving in **CAR**.

The MIL-Star® contributes to humanitarian and peace-keeping efforts of the **UN** mission forces by improving night operations marking of helicopter landing zones that can be identified at night from distances up to 10 Miles (16km).

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#### Helicopter usage for Humanitarian, Civil Protection and Peacekeeping Missions

While the helicopter has always been central to emergency operations, be they humanitarian, civil protection or peacekeeping missions, today's context makes aid agencies more likely to rely on specialised operators with helicopters featuring high standards in *safety, availability and efficiency* combined with high quality, tried and tested, lighting for helicopter landing sites and other related equipment to improve *safety, availability and efficiency*.

#### Added value of using helicopters in emergency operations:

One common denominator of all emergency responses is the pivotal role played by logistics in the timely delivery of what is needed, where it is needed, to save lives. To that effect, the helicopter proves instrumental in many ways, not only allowing operators to serve "last mile" destinations, but also to carry out vital CASEVAC or SECUEVAC missions in benefit of humanitarian personnel.

A helicopter can go pretty much anywhere with a level of accessibility, maneuverability, and versatility unmatched by other means of transport.

FEC Portapad combined with MIL-Star® air to ground controlled helipad lighting system provides a strong and consistent landing surface with 24/7 accessibility that can go into an area at a known cost for and set period of time and when the mission is complete relocated without the loss of the initial investment time and time again.

# Main challenges, current and future, for heliborne operations in the Humanitarian, Civil Protection and Peacekeeping sector

Finding the right helicopter operator with the right asset at the right time, and who is willing to engage in complex emergencies can prove quite difficult.

The global trend is here to stay. More complex crises and natural disasters in the future.

There is an overall need for a smarter consolidated logistics approach, notably in air operations which include the helicopter, to ensure modular heliborne solutions are readily available whenever and wherever needed.

In partnership with FEC Heliports Humanitarian, HEMS and Border Control operations can supply the landing infrastructure so badly need to improve and enhance helicopter landing site safety and to enable 24/7 operational capability.