

Hungarian Defence Forces Jozsef Kiss 86th Helicopter Wing



Szolnok Helicopter Base was a former German base until the base was captured by the Soviet Red Army during the Second World War and Szolnok became a Russian medical base for injured soldiers in 1944. When the Soviet Union fell apart, Hungary declared itself independent. In the early 90s at Szolnok the 89. 'Szolnok' Vegyes Szallito Repulo was based, and it was a mixed transport regiment with one squadron equipped with the An-26 Curl transport aircraft and two squadrons with Mi-8S and Mi-8T helicopters. At Szentkiralyszabadja the 87. 'Bakony' Harcihelikopter Ezred was based with two squadrons Mi-24D and Mi-24Vs, one squadron with Mi-8T helicopters and one squadron with Mi-17 transport and a small number of special mission equipped Mi-17PP helicopters. At Borgond was the 'Asboth Oszkar' helicopter regiment based with the Mi-2 helicopters.

During the nineties several reorganisations took place within the Hungarian Air Force, Borgond airbase was closed and the based Mi-2's were relocated to Szolnok airbase. Followed by the closure of Szentkiralyszabadja a

few years later and all the Mi-8s, Mi-17s and Mi-24s also transferred to Szolnok. The An-26 Curl transport aircraft transferred from Szolnok to Kecskemet Air Base. From that moment the unit at Szolnok was renamed from 89.



'Szolnok Vegyes Szallitorepulo-Ezred to MH 86. 'Szolnok' Helikopter Ezred. During the years the Mi-2s were withdrawn from use and a lot, but luckily not all, Mi-8s, Mi-17s and Mi-24s were also withdrawn from use. Also, an Air Academy was established within the Hungarian Air Force at Kecskemet Air Base. For this purpose twelve IAR-52's were acquired from Aerostar in Romania but were based at Szolnok, and twenty L-39ZO's were bought from former East Germany and they were based at Kecskemet. In 2009 all the L-39s were withdrawn from use and the Yak-52s were replaced by Zlin training aircraft in 2020. In 2018 Szolnok helicopter base was completely renewed due to the delivery of new helicopters and more training aircraft and the wing changed its name to MH Kiss Jozsef 86. Helikopterdandar which means 86th Helicopter Base.

The Zrinyi 2026 programme

At the end of 2016 the Hungarian Government launched the ambitious "Zrinyi 2026" modernisation programme, now called the National Defence and Armed Forces Development Programme, as a response to evolving security dynamics and increasing instability along NATO's eastern borders. Hungary enhanced focus on strengthening defensive capabilities and recognized the need to modernise its largely Soviet-era military equipment and align its capabilities with NATO standards.

For the ground forces the programme contained the acquisition of 218 Lynx KF41 Infantry Fighting Vehicles

(IFV), 44 Leopard 2A7+ main battle tanks and 24 PzH 2000 self-propelled howitzers.

For Air Defence and Electronic Warfare, the Hungarian Government invested significantly with the acquisition of National Advanced Surface-to-Air Missile System (NASAMS), medium-range air defence systems, Mistral MANPADS and 11 ELM-2084 radars, ensuring effective integration into NATO's integrated air defence network and enhancing protection for critical infrastructure.

The programme also included comprehensive digitalisation of command-and-control systems, implementing NATO-standard communications equipment and battlefield management systems including the development of cyber defence capabilities and the establishment of a dedicated cyber defence centre. For training and personnel development, the programme includes significant investment in new simulation centres, modernisation of training ranges and enhanced cooperation with NATO allies for joint training exercises.

A key aspect for the programme is its focus on developing Hungary's domestic defence industrial base which saw further expansion through partnerships with international firms, supporting long-term industrial growth.

For the Air Force, the programme involved the overhaul of eight Mi-24s and the acquisition of two Airbus A-319, two Falcon 7 and two KC-390 transport aircraft, two Zlin





143, six Zlin 242 and twelve L-39NG training aircraft and twenty H-145 and sixteen H-225 helicopters.

Modernisation of MH 86

The first part of the Zrinyi 2026 programme that was executed was the large overhaul of eight Mi-24 attack helicopters in Russia. This large overhaul, which extended the lifespan of the helicopters, started in 2017 and was completed in 2019. For pilot training eight Zlin training aircraft were ordered and the first four were delivered in 2018 followed by the other four in 2020. In June 2018 the Hungarian Ministry of Defence purchased twenty H-145 helicopters which were delivered between November 2019 and December 2021. These helicopters are equipped with HForce Modular Weapon Systems which offers the option to arm the helicopter with 70mm rockets, a 12.7 mm machine gun or a 20mm gun. Besides armament, the helicopters have a missile protection package, a fast-roping system, an electronic countermeasures system and an electro-optical targeting camera. These helicopters will be used for HForce, transport, Search and Rescue (SAR) and VIP tasks. The last part of the Zrinyi 2026 programme for MH 86 was the acquisition of sixteen H-225 helicopters by the Hungarian Ministry of Defence at the end of 2018 which were delivered between July 2023 and July 2025. These multi-role helicopters are equipped with state-of-the-art communication capabilities and have an all-weather capability supported by its night vision goggle

compatibility. They will be used for transport, Combat Search and Rescue (CSAR) and special operations. For the special operations six helicopters are equipped with HForce Modular Weapon Systems.

Due to the delivery of the twenty H-145s and sixteen H225 helicopters with accompanying equipment, there is also a need for more hangar space and platforms, and work is currently underway. A brand new state of the art facility is currently being built at the base with a massive platform and several hangars so that all of the helicopters can be parked inside, work on this new facility is well underway and will be finished soon, ones finished the H145M's and H225's will move to their new facility and will operate from here, while the Mi-17 and Mi-24's will not relocate the new facility they will operate from the dispersal area until the will be withdrawn from active service.

Present

At this moment MH Kiss Jozsef 86. Helikopter dandár (86th Helicopter Base) consists of three squadrons. The first is Szallito Helikopter Zaszloalj (Transport Helicopter Battalion) which are flying with the Mi-17, H-145 and H-225. The second is Phoenix Harchihelikopter Zaszloalj (Phoenix Attack Helicopter Battalion) and they are flying with the Mi-24 and H-145. The third squadron is Vegyes Kikepzo Repuloszazad (Mixed Training Aviation Squadron) and is also operating out of Szolnok but is on paper based at MH Vitez Szentgyorgyi Dezso 101. Repulodandar (101st

Tactical Airbase) Kecskemet Air Base. They are flying with the AS-350, Zlin 143 and Zlin 242 from Szolnok Air Base. The main difference between Zlin Z 143 and Zlin Z 242 is that Zlin Z 143 has a place for two people and Zlin Z 242 has a place for four people.

All the Zlin Z 143, Zlin Z 242, H-145 and H-225 are newly built, and the Hungarian Air Force will be able to operate with them in the coming decades, but this cannot be said of the ageing Russian built Mi-17 and Mi-24 helicopters. Only a handful of Mi-17s and Mi-24s are still operational but the question is, how long can they maintain operational? Due to lack of spare parts and an increasingly reduced number of crew members the days of the Mi-17s and Mi-24s are numbered. On paper they will be in service until the summer of 2026 if they have enough spare parts and crew to fly them. Due to the war between Russia and Ukraine it's now impossible to receive spare parts from the Russians, and due to lack of pilots, all pilots fly on two types, on the Mi-17 and H-145 or on the Mi-24 and H-225.

The Airbus Helicopters H-145 is built in Germany and is compact in size, easily flyable with a built-in mission capability and flexibility, especially in high and hot operating conditions and has a large and flexible cabin. The future pilots must follow a two-week study followed by two weeks flying in the simulator and then two weeks practice flights. The first pilots had their education in Germany, nowadays the education is done at Szolnok itself by the Hungarians itself.

Missions and exercises

In 2023 two H-145 helped in Slovenia with the massive floodings. From January 2024 one Mi-17 served EUFOR in Bosnia Herzegovina together with two H-145s. In the same year two Mi-17s, equipped with Bambi buckets, helped in Slovakia with large forest fires. In March 2025 one H-145 served KFOR in Kosovo as a recce element.

Currently, extensive training is being conducted with the H-225 helicopters, but they have also already been deployed to help in their own country as well as in other countries. The first deployment was in August 2024 to North Macedonia to help with forest fires and in September 2024 there were forest fires in Hungary itself where the H-225 helped. In October 2024 one H-225 replaced the Mi-17 in the EUFOR mission in Bosnia Herzegovina. In February 2025 the H-225 conducted the first life firing at the Bakony range. In June 2025 the exercises Fire Blade and Sabre Guardian took place at Papa Air Base to which four H-225s participated. Two H-225 helicopters were deployed to Albania in July 2025 to help with forest fires and a total of 568,000 litre water was dropped during 300 Bambi Bucket drops. In the same month one H-225 was deployed to Bulgaria to help with forest fire and for three days a total of 277,000 litre water was dropped by 146 Bambi Bucket drops. In August 2025 one H-225 was deployed to Montenegro to help with forest fires and there was a total of 132,000 litre water dropped by 66 Bambi Bucket drops.



Maintenance

A technical employee, responsible for the maintenance planning: "I started my military career in 2015 and was a mechanic for the engine and airframe shop until 2020, then I became the maintenance planner. The first mechanics for the H-145 went to Donauworth, Germany and the first mechanics for the H-225 went to Marseille, France. Their education lasted around 6 weeks and is not only study but also practical training. Mechanics for the Mi-17 and Mi-24 are now being retrained for the H-145 and H-225. These mechanics can follow their study at Szolnok itself but can also go to Donauworth, Germany or Marseille, France, that depends on what is the best for that person. The new H-145 and H-225 helicopters look different compared to the ageing Mi-17 and Mi-24, but the maintenance is the same, the only thing that is different is the avionics which are fully digital in the H-145 and H-225 and are not in the Mi-17 and Mi-24. Every 100 flight hours the H-145 and H-225 need small maintenance which lasts around three till four weeks and is done here at Szolnok. Every 600 flight hours they need a bigger inspection which takes more time. The maintenance on the Mi-17 and Mi-24 is simpler, the H-145 and H-225 have a lot of background compared to the Mi-17 and Mi-24. The only problem with these Russian made helicopters is to get spare parts from Russia. That's why the Mi-8s aren't flying anymore because they need spare parts. LOM Praha in Czechia can also deliver spare parts but then the guarantees from Russia will expire. We also had a problem with the language, every document of the Mi-17 and Mi-24 was translated by the Russians into Hungarian but on the H-145 and H-225 everything is in English, so the personnel needed to understand the English language but Airbus is supporting us very good and our personnel, around 60 people, are very satisfied.

The Squadron Commander with a total of 3000 flight

hours on the Yak-52, Mi-2 and Mi-8/Mi-17 and Deputy Commander with a total of 2500 flight hours on the Yak-52, Mi-2, Mi-8/Mi17 and Mi-24 were classmates, and both graduated in 1988 and came to Szolnok after graduation. Nowadays he doesn't fly much but will lose his license if he doesn't fly for 1.5 years so he flies the H-145 sometimes and his colleague has been flying the H-145 since 2021 and is now in conversion to the H-225.

The commander had his type conversion in Marseille, France. The study consists of three sections, 3 weeks study on the ground, 2.5 weeks training in the simulator and 2 weeks training flights. For maintenance there was another 1.5 weeks of training. The flight training has now been done at Szolnok itself. The cockpits from the H-145 are like the cockpit of the H-225.

According to the Deputy Commander the big difference between the Mi-17/Mi-24 and the H-145/H225 is that the pedals are the other way around due to the circulation of the rotor blades, this is not a big problem, but you must be aware of it during the flight, if you use the pedals wrong it will be a very big problem. The biggest gap between the old and the new helicopters are the old and new cockpits and the mapping systems. Also, the H-145 is very light compared to the Mi-17, the H-145 ways 3,5 tons and the Mi-17 13 tons and that was in the beginning very difficult for the pilots. The Mi-17 has more space for troops than the H-225 and that will be missed so hopefully the Mi-17s will be operational in the next years.

The pilots of the Mi-17 and Mi-24s did not have a choice on which helicopter they wanted to fly but we looked at where we needed pilots and told the pilots on which helicopter they were going to fly. The H-225 is not yet operational capable due to the many tasks the H-225 can do but we are on our way, now we are between initial and operational capability. Airbus is training our personnel so we can teach future pilots ourselves.

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