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**NATO AIR CHIEFS'
SYMPOSIUM**

**F-16 FROM NORWAY
AT CÂMPIA TURZII**

**SWIFT RESPONSE 24
EXERCISE**

**RAMSTEIN LEGACY 24
EXERCISE**





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COVER I: NORWEGIAN F-16. TAIL NUMBER
1622, TRANSFERRED TO ROMANIA AT DEPARTURE
FROM RYGGE AIR STATION

PHOTO BY ONAR DIGERNES AASE / FORSVARET
COVER III: ROMANIAN AIR FORCE AT BSDA 2024
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COVER IV: F-35 LANDING FOR BSDA 204
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– the source for the "A SHORT HISTORY OF NATO" section on pages 3 to 9 is the official NATO website, www.nato.int.

– the articles presented in the "NATO AGENDA" section (pages 10 to 27) are drawn from various sources. If a particular source is not explicitly stated, the information is sourced from the Allied Air Command Public Affairs Office.



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A SHORT HISTORY OF NATO

It is often said that the North Atlantic Treaty Organization was founded in response to the threat posed by the Soviet Union. This is only partially true. In fact, the Alliance's creation was part of a broader effort to serve three purposes: deterring Soviet expansionism, forbidding the revival of nationalist militarism in Europe through a strong North American presence on the continent, and encouraging European political integration.

The aftermath of World War II saw much of Europe devastated in a way that is now difficult to envision. Approximately 36.5 million Europeans had died in the conflict, 19 million of them civilians. Refugee camps and rationing dominated daily life. In some areas, infant mortality rates were one in four. Millions of orphans wandered the burnt-out shells of former metropolises. In the German city of Hamburg alone, half a million people were homeless.

In addition, Communists aided by the Soviet Union were threatening elected governments across Europe. In February 1948, the Communist Party of Czechoslovakia, with covert backing from the Soviet Union, overthrew the democratically elected government in that country. Then, in reaction to the democratic consolidation of West Germany, the Soviets blockaded Allied-controlled West Berlin in a bid to consolidate their hold on the German capital. The heroism of the Berlin Airlift provided future Allies with some solace, but privation remained a grave threat to freedom and stability.

A TREATY FOR OUR AGE

Fortunately, by then the United States had turned its back on its traditional policy of diplomatic isolationism. Aid provided through the US-funded Marshall Plan (also known as the European Recovery Program) and other means fostered a degree of economic stabilisation. European states still needed confidence in their security, however, before they would begin talking and trading with each other. Military cooperation, and the security it would bring, would have to develop in parallel with economic and political progress.

With this in mind, several Western European democracies came together to implement various projects for greater military

cooperation and collective defence, including the creation of the Western Union in 1948, later to become the Western European Union in 1954. In the end, it was determined that only a truly transatlantic security agreement could deter Soviet aggression while simultaneously preventing the revival of European militarism and laying the groundwork for political integration.

Accordingly, after much discussion and debate, the North Atlantic Treaty was signed on 4 April, 1949. In the Treaty's renowned Article 5, the new Allies agreed "an armed attack against one or more of them... shall be considered an attack against them all" and that following such an attack, each Ally would take "such action as it deems necessary, including the use of armed force" in response. Significantly, Articles 2 and 3 of the Treaty had important purposes not immediately germane to the threat of attack. Article 3 laid the foundation for cooperation in military preparedness between the Allies, and Article 2 allowed them some leeway to engage in non-military cooperation.

**WE DO NOT KEEP SECURITY
ESTABLISHMENTS MERELY TO DEFEND
PROPERTY OR TERRITORY OR RIGHTS
ABROAD OR AT SEA. WE KEEP THE
SECURITY FORCES TO DEFEND A WAY OF
LIFE.**

Dwight D. Eisenhower, 1954

While the signing of the North Atlantic Treaty had created Allies, it had not created a military structure that could effectively coordinate their actions. This changed when growing worries about Soviet intentions culminated in the Soviet detonation of an atomic bomb in 1949 and in the outbreak of the Korean War in 1950. The effect upon the Alliance was dramatic. NATO soon gained a consolidated command structure with a military Headquarters based in the Parisian suburb of Rocquencourt, near Versailles. This was Supreme Headquarters Allied Powers Europe, or SHAPE, with US General Dwight D. Eisenhower as the first Supreme Allied Commander Europe, or SACEUR. Soon afterward, the Allies established a permanent civilian secretariat in Paris, and named NATO's

first Secretary General, Lord Ismay of the United Kingdom.

With the benefit of aid and a security umbrella, political stability was gradually restored to Western Europe and the post-war economic miracle began. New Allies joined the Alliance: Greece and Türkiye in 1952, and West Germany in 1955. European political integration took its first hesitant steps. In reaction to West Germany's NATO accession, the Soviet Union and its Eastern European client states formed the Warsaw Pact in 1955. Europe settled into an uneasy stand-off, symbolised by the construction of the Berlin Wall in 1961.

During this time, NATO adopted the strategic doctrine of "Massive Retaliation" – if the Soviet Union attacked, NATO would respond with nuclear weapons. The intended effect of this doctrine was to deter either side from risk-taking since any attack, however small, could have led to a full nuclear exchange. Simultaneously, "Massive Retaliation" allowed Alliance members to focus their energies on economic growth rather than on maintaining large conventional armies. The Alliance also took its first steps towards a political as well as a military role. Since the Alliance's founding, the smaller Allies in particular had argued for greater non-military cooperation, and the Suez Crisis in the fall of 1956 laid bare the lack of political consultation that divided some members. In addition, the Soviet Union's launch of the Sputnik satellite in 1956 shocked the Allies into greater scientific cooperation. A report delivered to the North Atlantic Council by the Foreign Ministers of Norway, Italy, and Canada – the "Three Wise Men" – recommended more robust consultation and scientific cooperation within the Alliance, and the report's conclusions led, inter alia, to the establishment of the NATO Science Programme.

FROM DEFENCE TO DÉTENTE

In the 1960s, this uneasy but stable status quo began to change. Cold War tensions re-ignited as Soviet premier Nikita Khrushchev and US President John F. Kennedy narrowly avoided conflict in Cuba, and as American involvement in Vietnam escalated. Despite this unpropitious start, by decade's end what had been primarily a defence-based organisation

came to embody a new phenomenon: détente, a relaxation of tensions between the Western and Eastern blocs driven by a grudging acceptance of the status quo.

During this decade, NATO and SHAPE unexpectedly moved to a new home. In March 1966, France announced its intention to withdraw from NATO's integrated military command structure and requested the removal of all Allied headquarters from French territory. A new SHAPE Headquarters was established in Casteau, Belgium in March 1967, and NATO HQ moved to Brussels in October of the same year. Significantly, France remained within the Alliance and consistently emphasised its intention to stand together with its Allies in the event of hostilities. France also proved to be among the Alliance's most valuable force contributors during later peacekeeping operations. Flexibility was always key to NATO's success, and the French withdrawal from NATO's integrated military command structure demonstrated that NATO, unlike the Warsaw Pact, could tolerate differing viewpoints between its members.

As a reminder of this point, in August 1968, the Soviet Union led an invasion of Czechoslovakia that put an end to a period of political liberalisation in that country known as the Prague Spring. Like a similar invasion of Hungary in 1956 and military repression in Berlin in 1953, Soviet actions demonstrated what became known as the Brezhnev Doctrine: given the choice between short-term control of Eastern European client states and long-run political and economic reform, the Soviet Union would choose to maintain short-term control. The end of this policy would await a Soviet leader willing to choose long-run reform.

Détente had many faces. West German Chancellor Willy Brandt's Ostpolitik sought to encourage European stability through closer relations between Eastern and Western Europe. US President John F. Kennedy's strategy of "Flexible Response" sought to replace Massive Retaliation's absolute dichotomy of peace or



From June 1948 to May 1949, the world experienced one of the first crisis of the Cold War Period - the Berlin Blockade

total nuclear war. Adopted in the wake of the Cuban Missile Crisis, Flexible Response enhanced NATO's conventional defence posture by offering military responses short of a full nuclear exchange in the event of conflict. Also during this time, a report entitled "The Future Tasks of the Alliance", delivered in December 1967 to the North Atlantic Council by Belgian Foreign Minister Pierre Harmel, recommended that NATO should have a political track promoting dialogue and détente between NATO and Warsaw Pact countries. The role of NATO had become not merely to preserve the status quo, but to help change it.

The Harmel Report helped to lay the foundation for the convening of the Conference on Security and Co-operation in Europe in 1973. Two years later, the Conference led to the negotiation of the Helsinki Final Act. The Act bound its signatories – including the Soviet Union and members of the Warsaw Pact – to

respect the fundamental freedom of their citizens, including the freedom of thought, conscience, religion or belief. Soviet rulers internally played down these clauses within the Act, attaching more importance to the Western recognition of the Soviet role in Eastern Europe. Eventually, however, the Soviets came to learn that they had bound themselves to powerful and potentially subversive ideas.

THE COLD WAR REVIVED

The 1979 Soviet invasion of Afghanistan and the Soviet deployment of SS-20 Saber ballistic missiles in Europe led to the suspension of détente. To counter the Soviet deployment, Allies made the "dual track" decision to deploy nuclear-capable Pershing II and ground-launched cruise missiles in Western Europe while continuing negotiations with the Soviets. The deployment was not scheduled to begin until 1983. In the meantime, the Allies hoped to achieve an arms control agreement that would eliminate the need for the weapons.

Lacking the hoped-for agreement with the Soviets, NATO members suffered internal discord when deployment began in 1983. Following the ascent of Mikhail Gorbachev as Soviet Premier in 1985, the United States and the Soviet Union signed the Intermediate-Range Nuclear Forces (INF) Treaty in 1987, eliminating all nuclear and ground-launched ballistic and cruise missiles with intermediate ranges. This is now regarded as an initial indication that the Cold War was coming to an end. The 1980s also saw the accession of NATO's first new member since 1955. In 1982, a newly democratic Spain joined the transatlantic Alliance.

By the mid-1980s, most international observers believed that Soviet Communism had lost the intellectual battle with the West. Dissidents had dismantled the ideological supports of Communist regimes, a process aided in retrospect by the Soviet Union's own ostensible adherence to human rights principles outlined by the Helsinki Final Act.



Twelve countries sign the North Atlantic Treaty on 4 April 1949 in Washington, D. C. and bring the Alliance to life

By the late 1980s, the communist government of Poland found itself forced to negotiate with the formerly repressed independent trade union "Solidarity" and its leader, Lech Wałęsa. Soon other democratic activists in Eastern Europe and the Soviet Union itself would begin to demand those very rights.

By this time, command economies in the Warsaw Pact were disintegrating. The Soviet Union was spending three times as much as the United States on defence with an economy that was one-third the size. Mikhail Gorbachev came to power with the intention of fundamentally reforming the communist system. When the East German regime began to collapse in 1989, the Soviet Union did not intervene, reversing the Brezhnev Doctrine. This time, the Soviets chose long-run reform over a short-run control that was increasingly beyond their capabilities, setting in motion a train of events that led to the break-up of the Warsaw Pact.

**BE CAREFUL WHAT YOU WISH FOR
THE COLLAPSE OF SOVIET COMMUNISM
HAS LEFT US WITH A PARADOX: THERE IS
LESS THREAT, BUT ALSO LESS PEACE.
Manfred Wörner, 1993**

The fall of the Berlin Wall on 9 November 1989 seemed to proclaim a new era of open markets, democracy and peace, and Allies reacted with incredulous joy as emboldened demonstrators overthrew Eastern European Communist governments. But there were also frightening uncertainties. Would a united Germany be neutral? What would become of nuclear weapons in former Soviet republics? Would nationalism once again curse European politics? For NATO, the question was existential: was there any further need for the Atlantic Alliance?

NATO endured because while the Soviet Union was no more, the Alliance's two other original if unspoken mandates still held: to deter the rise of militant nationalism and to provide the foundation of collective security that would encourage democratisation and political integration in Europe. The definition of "Europe" had merely expanded eastward. Before the consolidation of peace and security could begin, however, one spectre haunting European politics remained to be exorcised. Since the Franco-Prussian War, Europe had struggled to come to terms with a united Germany at its heart. The incorporation of a re-unified Germany into the Alliance put this most ancient and destructive of dilemmas to rest.

In 1991 as in 1949, NATO was to be the foundation stone for a larger, pan-European security architecture. In December 1991, the Allies established the North Atlantic Cooperation Council, renamed the Euro-Atlantic Partnership Council in 1997. This forum brought the Allies together with their Central European, Eastern European, and Central Asian neighbours for joint consultations. Many of these newly liberated countries – or partners, as they were soon called – saw a relationship with NATO as fundamental to their own aspirations for stability, democracy, and



General Dwight D. Eisenhower, NATO's first Supreme Allied Commander Europe (SACEUR), inspects the new flag for Supreme Headquarters Allied Powers Europe (SHAPE) on the outskirts of Paris in October 1951. The Latin motto on the flag, "Vigilia Pretium Libertatis", translates to "vigilance is the price of liberty" in English

European integration. Cooperation also extended southward. In 1994, the Alliance founded the Mediterranean Dialogue with six non-member Mediterranean countries: Egypt, Israel, Jordan, Mauritania, Morocco and Tunisia, with Algeria also joining in 2000. The Dialogue seeks to contribute to security and stability in the Mediterranean through better mutual understanding.

This fledgling cooperation was soon put to the test. The collapse of Communism had given way to the rise of nationalism and ethnic violence, particularly in the former Yugoslavia. At first, Allies hesitated to intervene in what was perceived as a Yugoslav civil war. Later the conflict came to be seen as a war of aggression and ethnic cleansing, and the Alliance decided to act. Initially, NATO offered its full support to United Nations efforts to end war crimes, including direct military action in the form of

a naval embargo. Soon the enforcement of a no-fly zone led to airstrikes against heavy weapons violating UN resolutions. Finally, the Alliance carried out a nine-day air campaign in September 1995 that played a major role in ending the conflict. In December of that year, NATO deployed a UN-mandated, multinational force of 60 000 soldiers to help implement the Dayton Peace Agreement and to create the conditions for a self-sustaining peace. In 2004, NATO handed over this role to the European Union.

The Yugoslav conflict – and other contemporaneous conflicts in the Caucasus and elsewhere – made clear that the post-Cold War power vacuum was a source of dangerous instability. Mechanisms for partnership had to be strengthened in a way that would allow non-NATO countries to cooperate with the Alliance to reform still-evolving democratic



1954 - at NATO Headquarters in Paris, Allies sign a document inviting West Germany to join the Alliance. The Eiffel Tower is visible in the background



1962 - planes fly in 'NATO' formation over the Acropolis in Athens, Greece during a ministerial meeting in May 1962

and military institutions and to relive their strategic isolation. As part of this evolving effort, Allies created the Partnership for Peace programme, or PFP, in 1994. The Partnership for Peace allowed non-NATO countries, or "Partners", to share information with NATO Allies and to modernise their militaries in line with modern democratic standards. Partners were encouraged to choose their own level of involvement with the Alliance. The path to full membership would remain open to those who decided to pursue it.

This process reached an important milestone at the 1999 Washington Summit when three former Partners – Czechia, Hungary and Poland – took their seats as full Alliance members following their completion of a political and military reform programme. Through enlargement, NATO had played a crucial role in consolidating democracy and stability in Europe. Even before the new Allies joined NATO in Washington, however, a new crisis had already broken out.

By the end of 1998, over 300 000 Kosovar Albanians had fled their homes during conflict between Albanian separatists in Kosovo and Serbian military and police. Following the failure of intense international efforts to resolve the crisis, the Alliance conducted air strikes for 78 days and flew 38 000 sorties with the goal of allowing a multinational peacekeeping force to enter Kosovo and cease ethnic cleansing in the region. On 4 June 1999, NATO suspended its air campaign after confirming that a withdrawal of the Serbian army from Kosovo had begun, and the deployment of the NATO-led Kosovo Force (KFOR) followed shortly thereafter. Today, KFOR troops are still deployed in Kosovo to help maintain a safe and secure environment and freedom of movement for all citizens, irrespective of their ethnic origin.

THE 9/11 CATALYST

NATO's experiences in Bosnia and Kosovo demonstrated that the debate of whether NATO was to enforce a European peace was moot: events had forced the Alliance's hand.

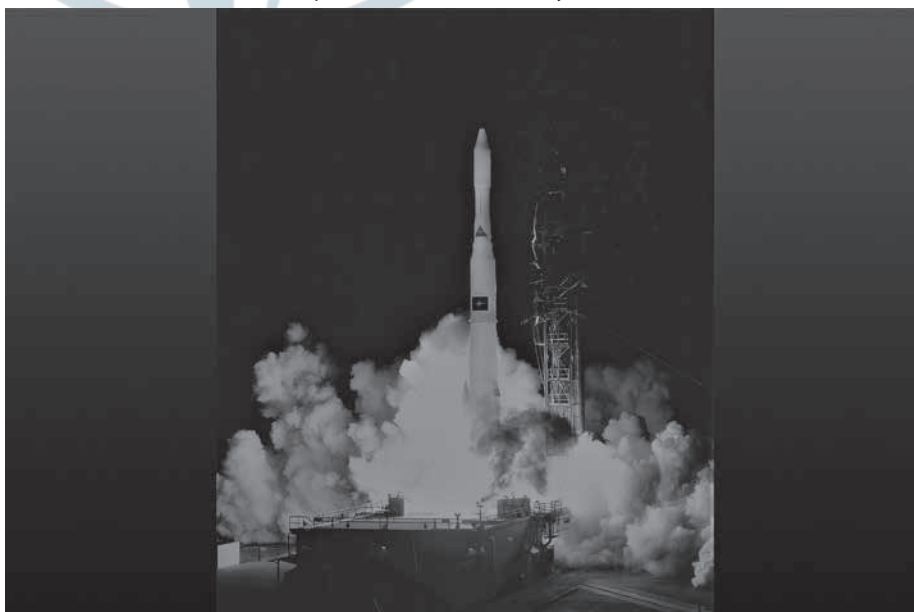
to Euro-Atlantic peace and security, including oppression, ethnic conflict, economic distress, the collapse of political order, and the proliferation of weapons of mass destruction." These words would soon prove prescient.

The 11 September 2001 terrorist attacks on the World Trade Center and the Pentagon demonstrated to the Allies that political disorder in distant parts of the globe could have terrible consequences at home. For the first time in its history, NATO invoked its collective defence clause (Article 5). Substate actors – in this case, the al-Qaida terrorist group – had used Afghanistan as a base to export instability to the industrialised world, adopting hijacked airliners as improvised weapons of mass destruction to kill thousands of civilians. Subsequent attacks, including the Istanbul bombings in November 2003, the attack of the Madrid commuter train system on 11 March 2004 and the public transport system in London on 7 July 2005, made clear that violent extremists were determined to target civilian populations.

IN VERY DIFFERENT CIRCUMSTANCES TO THAT ENVISAGED BY THE AUTHORS OF ARTICLE 5 IN 1949, THE MIGHTY ALLIANCE HAD STOOD BY AN ALLY UNDER ATTACK. THE WORLD THAT DAY HAD CHANGED, AND NATO'S TRANSFORMATION IN THE POST-9/11 WORLD HAD BEGUN.

Lord Robertson, 2011

In the aftermath of the 9/11 attacks, a coalition of countries – including many NATO Allies – militarily intervened in Afghanistan in the fall of 2001. The goal of the mission, Operation Enduring Freedom, was to deny al-Qaida a base of operations and to detain as many al-Qaida leaders as possible. In December 2001, following the overthrow of the Taliban regime, UN Security Council Resolution 1386 authorised the deployment of the International Security Assistance Force (ISAF), a multilateral force in and around Kabul to help stabilise the country and create the conditions of a



NATO's first communications satellite launches at Cape Canaveral, Florida in December 1970



1982 - fighter jets fly over Neuschwanstein Castle – the fairy tale palace that inspired the legendary Disney castle – in Germany during exercise REFORGER 82

self-sustaining peace. In August 2003, NATO took over command and coordination of ISAF.

Meanwhile, NATO continued to accept new members and to build new partnerships. The NATO-Russia Council was established in 2002 so that individual NATO member states and Russia could work as equal partners on security issues of common interest. In 2004, the Alliance launched the Istanbul Cooperation Initiative as a way of offering practical bilateral security cooperation to countries of the broader Middle East region. Finally, subsequent rounds of enlargement brought more Allies into the fold – Bulgaria, Estonia, Latvia, Lithuania, Romania, Slovakia and Slovenia in 2004, Albania and Croatia in 2009, Montenegro in 2017, North Macedonia in 2020, Finland in 2023 and Sweden in 2024.

A NEW APPROACH FOR A NEW CENTURY

In Afghanistan, as in Bosnia and Kosovo, Allies have seen that military power is not enough to ensure peace and stability. Peacekeeping has become at least as difficult as peacemaking. During the Cold War years, Allied security had entailed the defence of the North Atlantic Allies; now the definition of "security" has radically expanded to include the individual's freedom from the violent extremism bred by instability and nation-state failure. For instance, much of the world's attention in 2011 was focused on the crisis in Libya where NATO played a crucial role in helping to protect civilians under attack from their own government, as mandated by the United Nations. The level of violence used by the Libyan security forces against pro-democracy protestors was such that the international community agreed to take collective action. Indifference was simply not an option.

Successful peacekeeping has come to entail not merely providing a baseline of security, but assisting in the construction of modernity itself. This task is beyond NATO, and the Allies know it. The Alliance is not and

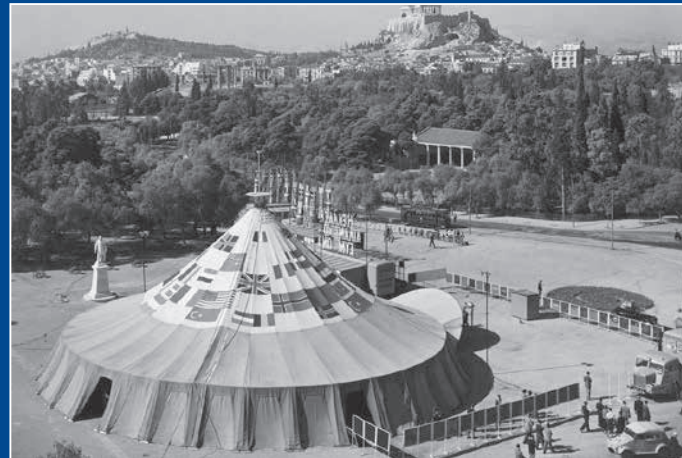
governance, development, and judiciary reform. Whether helping to build lasting peace in Pristina, securing the Mediterranean Sea or providing assistance to the African Union, NATO has been increasing cooperation with other international organisations that can bring their superior reconstruction and civil-society building capabilities to bear.

The 21st century will not be all about peacebuilding, however. Russia's illegal annexation of Crimea in 2014 and its unjustified and unprovoked attack on Ukraine are a sobering reminder of the importance of NATO's core task: collective defence. This, coupled with the Syrian conflict, the rise of ISIL and terrorism (and often homebred terrorism), has become a brutal reality across many continents. Meanwhile, tensions rise as migrants seek refuge from conflict in countries that are struggling with the weight of ethnic and religious strife, demographic pressures and economic underperformance. Cyberattacks are becoming ever more frequent and ever more destructive. And through social media and other means, the opponents of liberal open societies are spreading disinformation and propaganda that seek to undermine the values that NATO has always sought to protect and promote. Altogether, the complexity of the current security environment is such that NATO's flexibility is yet again put to the test.

Since its founding in 1949, the transatlantic Alliance's flexibility, embedded in its original Treaty, has allowed it to suit the different requirements of different times. In the 1950s, the Alliance was a purely defensive organisation. In the 1960s, NATO became a political instrument for détente. In the 1990s, the Alliance was a tool for the stabilisation of Eastern Europe and Central Asia through the incorporation of new partners and Allies. In the first half of the 21st century, NATO faces an ever-growing number of new threats. As the foundation stone of transatlantic peace and freedom, NATO must be ready to meet these challenges.



Berliners join hands atop the Berlin Wall near the Brandenburg Gate, celebrating the reunification of their city in November 1989



1952 - the NATO caravan – a mobile exhibition that travelled across Europe – sits in Athens with the Parthenon in the distance. The NATO caravan visited Greece from 7 September to 2 November 1952. During 50 exhibition days, over 750,000 visitors from Athens and Thessaloniki viewed the exhibition



1955 - a soldier takes a moment to pet a deer during a military exercise in West Germany as a smiling farmer looks on.



1956 - a group of women officers from several Allied armed forces go for a stroll around Paris and visit the Eiffel Tower, which is just across the river from NATO Headquarters at the Palais de Chaillot



1967 - civilians sunbathe next to an armoured vehicle near the border between East and West Berlin. Learn more about how Berlin was divided during the Cold War



1971 - NATO civilian staff are caught up in a flurry of activity in a fancy room at the São Bento Palace during the 1971 NATO ministers' meeting in Lisbon, Portugal



1974 - a soldier (look closer, you'll spot him!) is caught taking a nap in a truck during artillery training in Belgium, May 1974



1977 - soldiers share a snack and a laugh during the Canadian Army Trophy tank competition, a gunnery contest hosted by the Canadian Armed Forces in Germany during the Cold War



1985 - a soldier smiles while holding an umbrella and standing in the muddy tank ruts during exercise REFORGER 85 in Germany

1992 - soldiers hold up flares to indicate a landing zone during a joint exercise between the United States and Russia after the end of the Cold War. Allied and Russian forces cooperated and trained together until Russia's illegal annexation of Crimea in 2014



1995 - a fighter jet prepares to take off from the deck of an aircraft carrier during a meeting of NATO defence ministers in Williamsburg, United States



1999 - a sailor looks through an anti-aircraft targeting sight during a maritime exercise in the Black Sea, March 1999 (Photo © Reuters/STR New)



2023 - the British Army's Royal Lancers (Queen Elizabeths' Own) take part in Operation Cabrit, the UK operational deployment to Estonia, where UK troops are leading a NATO multinational battlegroup. Pictured here: the Royal Lancers get back to their cavalry heritage by conducting mounted armoured reconnaissance with the Polish Territorial Defence Force's 2nd Lubelska (Lublin) Brigade. This is NATO photo of the year in 2023 (Photo credit: The Royal Lancers, British Army)



MEETING OF THE MINISTER OF NATIONAL DEFENSE WITH THE DUTCH MINISTER OF DEFENSE AT 86th AIR BASE

The Minister of National Defense, Angel Tîlvăr, met on Wednesday, April 17, with his counterpart from the Kingdom of the Netherlands, Kajsa Ollongren. This meeting coincided with the visit of the Dutch official to the 86th Air Base "Airman Lieutenant Gheorghe Mociorniță," marked by the arrival in Romania of three additional aircraft for the F-16 Training Center.

The Dutch minister arrived in Romania aboard one of the combat aircraft, piloted by the commander of the Royal Netherlands Air Force, Lieutenant General Andre Steur. The Dutch aircraft was met in Romania's airspace by two F-16 aircraft of the Romanian Air Force, which had on board Minister Angel Tîlvăr and the Chief of the Defense Staff, General Gheorghiu Vlad. After landing, the two ministers engaged in a dialogue focused on political-military and security issues, emphasizing the importance of the context in the Black Sea region. The meeting highlighted the close cooperation between the two ministries, particularly within the framework of the joint European F-16 Training Center project. The center, a unique capability on the European continent, offers pilot training options for Romania, allied countries in the region, and Ukraine. Minister Tîlvăr welcomed the arrival of three more Dutch aircraft in Romania, which will be added to the eight already in use at the Center.

The two officials expressed their willingness to identify solutions to continue the activity of the European F-16 Training Center beyond 2025.



"With F-16s, Ukraine can better defend itself against Russian aggression. We are working hard to transfer the devices as quickly as possible," Dutch Defense Minister Kajsa Ollongren remarked during the acceptance ceremony in Romania.

"The Ukrainian air force currently still flies Soviet aircraft and must make the transition to the F-16. That takes years in peacetime. Now everything is being done to speed up the process. It is necessary to train sufficient staff and have the infrastructure in order. In this way, the Ukrainian air force will soon be able to effectively deploy the F-16s," concluded Dutch Defense Minister.

"We consider the European F-16 Training Center an important achievement and a nodal point for regional security that will allow us to achieve training standards at the level of our allies and partners. We will thus contribute to increasing cohesion, demonstrating unity, and strengthening the defense and the ability to deter any aggression for the Euro-Atlantic space," said Minister Tîlvăr.

The Romanian Minister of Defense thanked the Netherlands for its involvement in

supporting the security and defense measures implemented in Romania. At the end of the meeting, Angel Tîlvăr congratulated Kajsa Ollongren for her decision to come to Romania aboard one of the F-16 aircraft.

"For me, personally, flying aboard a combat aircraft was a first-time experience, for which I am grateful to the instructor pilot who was at the helm of the F-16 aircraft of the Romanian Air Force. Through our presence, as Ministers of Defense, on board combat aircraft, we experienced firsthand the execution of such missions and honored the courage and determination of the pilots who ensure our freedom, peace, and tranquility from the air!" said Minister Angel Tîlvăr.

This event reconfirmed the commitment of Romania and the Kingdom of the Netherlands to deepen cooperation and contribute to an improved security climate, regionally and globally.

**Story by Adrian Sultănoiu
based on information provided
by Romanian MoD Press Office
Photo: Bogdan Pantilimon ROU AF PAO**

The two ministers engaged in a dialogue focused on political-military and security issues, emphasizing the importance of the context in the Black Sea region. The meeting highlighted the close cooperation between the two ministries, particularly within the framework of the joint European F-16 Training Center project



NATO AIR CHIEFS DISCUSSED INTEGRATED OPERATIONS AND TRANSFORMING NATO AIR AND SPACE POWER

Allied Air Command has hosted semi-annual NATO Air Chiefs' Symposiums for several years. These gatherings provide a venue for senior representatives of NATO members' air forces to exchange views and discuss cooperation, coordination, and the development of NATO Air and Space Power. Major General Leonard Baraboi, Chief of the Romanian Air Force, represented Romania at this significant event.

During the first NATO Air Chiefs' Symposium (NACS) of 2024, senior leaders from Allied air forces, NATO, and international organizations convened to discuss enhancing integrated operations in NATO Air and Space Power and to commemorate the 75th anniversary of the Alliance. The Ukrainian Air Force Chief of Staff joined the deliberations via video teleconference. Opening the symposium, General James B. Hecker provided strategic context, stating, "The continued defense

of NATO is underpinned by the successful integration of capabilities across the entirety of the Alliance. This conference underscores the commitment of each nation to the collective defense of all NATO, and I look forward to our continued pursuit of the evolution of airpower to that end." Building on the previous NACS theme of operationalizing integration, participants discussed various topics, including the air fight in joint campaigns, Agile Combat Employment practicalities, and

Space Component development and requirements. A significant portion of the discussions focused on Integrated Air and Missile Defense lessons learned from the war in Ukraine.

To mark the 75th anniversary of the NATO Alliance, General Hecker invited NACS attendees to join Allied Air Command staff for a brief ceremony. In his remarks, he praised the Alliance's long-standing tradition as a guarantor of collective security, peace, and stability for more than one billion people in the 32 member nations.

"From its founding 75 years ago, building bridges and working towards consensus in collective security in post-World War II times, NATO has had a historic record of success and relevance,"

said General Hecker. "Today, 75 years later, NATO is built on an enduring commitment to our shared values and our ability to adapt to emerging challenges. We celebrate our collective history of military preparations, innovations, and operations." "For almost 50 years, an Allied command authority for air forces has supported NATO's overall commitment to collective security out of Ramstein Air Base," explained General Hecker. "Since 1974, we have been delivering Air and Space Power to the Alliance, coordinating efforts with national Air and Space Forces, and honing Air and Space contributions to collective security, deterrence, and defense."



During the NATO Air Chiefs' Symposium, senior leadership from Allied air forces, NATO and international organisations convened to discuss how to enhance integrated operations in NATO Air and Space Power. The Ukrainian Air Force Chief of Staff joined the deliberations by video conference. Photo by Arnaud Chamberlin.

"This conference underscores the commitment of each of the nations to the collective defence of all of NATO, and I am looking forward to our continued pursuit of the evolution of airpower to that end," said AIRCOM Commander General James Hecker (second from left) Photo by Arnaud Chamberlin



The NACS attendees and staff from Allied Air Command attended a brief ceremony marking the 75th anniversary of NATO. Photo by Arnaud Chamberlin

SPAIN DEPLOYED FIGHTERS TO NATO AIR SHIELDING MISSION IN ROMANIA

MIHAIL KOGALNICEANU, Romania – Five Spanish Eurofighters and a roughly 60-strong support detachment joined NATO's Air Shielding mission, performing training and deterrence missions from Mihail Kogălniceanu Air Base on Romania's Black Sea coast. The Spanish detachment, dubbed "PAZNIC", arrived on April 8, 2024, and integrated with NATO Allies for a two-week period. The Air Shielding mission aimed to enhance NATO's defensive posture along the eastern flank, increasing the air and missile defense capabilities. This included contributions from Allied fighter squadrons like the Spanish Eurofighters and surface-based air and missile defense units such as the French MAMBA system in Romania.



On April 16, 2024, Spanish aircraft deployed to Lithuania and Romania combined their efforts to fly a NATO mission, shielding airspace over Romania. Spanish F/A-18 jets from NATO's Baltic Air Policing at Siauliai, Lithuania, joined the Spanish Eurofighters at Mihail Kogălniceanu, Romania, to conduct aerial combat drills. The mission was supported by a Spanish A400M air-to-air refueling aircraft, enabling extended range operations during a five-hour flight from the north to the south of NATO's eastern flank. "Our detachment dubbed PAZNIC arrived here on April 8, and for two weeks we integrated with our Allies to fly alongside them," said the Spanish Detachment Commander, Lieutenant Colonel Victor Garrido. "During this time, we augmented NATO's defensive posture along the eastern

flank, firmly embedded in the air and missile defense arrangements," he added. "We conducted this deployment using Agile Combat Employment (ACE) procedures. This expeditionary organization with limited support staff relied heavily on the Host Base support and cooperation with the RAF Typhoon team deployed here. It provided valuable experience to the Spanish Air Force in the field of the Agile Combat Employment concept," said Lieutenant Colonel Garrido. "This kind of training was extremely important for our aircrew and ground crews alike," said Lieutenant General Juan Pablo Sanchez de Lara, commander of NATO's Southern Combined Air Operations Centre at Torrejón, Spain. "While both Spanish detachments were assigned for NATO missions, we used every opportunity to enhance our pilots' skills and

demonstrate Alliance capabilities and readiness. Adding an air-to-air refueling capability provided even more training benefits and added complexity to our planners' tasks," he added. Lieutenant General Sanchez de Lara concluded, "Training missions like the one on April 16 underscored that NATO had robust and flexible forces in place to support Alliance deterrence and defense.

These drills prepared our forces to shield and protect Alliance citizens and territory from armed attack wherever needed. They also testified to the excellent cooperation between our two CAOCs, ensuring seamless command and control across distances of 2,000 kilometers.

FINNISH JETS LAND IN ROMANIA FOR FIRST PARTICIPATION IN NATO AIR SHIELDING MISSION



Integrated already in flight - during the deployment to Romania, Finnish F/A-18 jets and a German A400M conduct refuelling operations. Photo by Finnish Air Force

Seven Finnish Air Force F/A-18 Hornet fighter jets landed at Mihail Kogălniceanu Air Base near Constanța in Romania on June 3. This first deployment under NATO's Air Shielding mission will see them conducting both training and real-world sorties along the eastern flank on the Black Sea coast.

"For two months the Finnish jets are joining a Royal Air Force Typhoon detachment and will be doing quick-reaction alert duty and flying alongside them and Romanian F-16s collectively

securing NATO airspace and assuring the Romanian population," said Lieutenant Colonel Rami Lindström, the first commander of the Finnish detachment at Mihail Kogălniceanu. "Our objective here in Romania is to enhance our integration into NATO Air Power by honing and deepening our cooperation with the Royal Air Force and the Romanian Air Force," he added underscoring the deployment as a milestone towards further developing "our capability to operate from another Allied air base." NATO provides peacetime deterrence and defence tasks through the Air Policing and Air Shielding missions. Member states' air forces surveil and protect the integrity of Allied airspace through the standing Air Policing mission. The Air Shielding mission, on the other hand, consists of an increased presence of fighter jets and ground-based air defence units in NATO's eastern member states. The tasks of the fighter detachments participating in the Air Shielding mission include quick-reaction alert duty, patrol flights under the command of NATO's integrated air and missile defence, as well as exercise activities and maintaining the collective deterrence of the Alliance.

Consisting of seven F/A-18 Hornet fighter jets and fewer than 100 airmen, the detachment's first goal was achieving full operational readiness. Together with the RAF Typhoons, they participated in NATO's Integrated Air and Missile Defence (IAMD) exercise Ramstein Legacy in June, which provided further opportunities for boosting interoperability in Allied Air Command's major IAMD exercise.

RAF EUROFIGHTERS IN ROMANIA FOR NATO AIR POLICING MISSION

MIHAIL KOGALNICEANU, Romania – Six Royal Air Force (RAF) Eurofighter Typhoon aircraft landed at Romania's Mihail Kogălniceanu Air Base on March 25, 2024, to support NATO's enhanced Air Policing (eAP) mission. This deployment marked the RAF's fifth eAP rotation in Romania since their first mission in 2014.

For four months, the Typhoons, along with approximately 200 personnel from RAF Lossiemouth in Scotland, operated under NATO command alongside the Romanian Air Force. These missions were designed to enhance the reaction and deterrence capabilities of the Alliance, ensuring continuous air security across NATO airspace. During certification ceremony General Costa expressed his appreciation for the contributions of both the United Kingdom and Romania, emphasizing the importance of this collaboration for maintaining European airspace security. "This mission is a testament to the strength and cohesion of our Alliance," said Wing Commander Karl Bird, Commanding Officer of 140 Expeditionary Air Wing. "As we



Six Royal Air Force Typhoons and a detachment of well over 200 support personnel were declared ready to fly NATO enhanced Air Policing missions out of the Romanian Air Base near Constanța. Photo courtesy Romanian Air Force

celebrated 75 years of NATO, our integration with Romanian forces highlighted our collective commitment to peace and stability in the Euro-Atlantic area." Enhanced Air Policing missions were part of NATO's Assurance Measures, introduced in 2014 following Russia's annexation of Crimea. These measures demonstrated the collective resolve and defensive nature of NATO, deterring aggression and safeguarding Allied airspace. The RAF's deployment to Mihail Kogălniceanu Air Base supported Quick Reaction Alert (QRA) missions, responding to security challenges until August 2024. Allied air detachments were stationed at various Romanian air bases, including

Borcea and Campia Turzii, flying alongside the Romanian Air Force. Additionally, NATO's Integrated Air and Missile Defence System (NATINAMDS) in Romania was bolstered by a French surface-based air and missile defense system operating from Capu Midia, showcasing the integrated defense posture of the Alliance.

These deployments, planned in advance and rotating among NATO members, underscored the flexibility and scalability of NATO's response to evolving security situations, sending a clear message of deterrence and collective defense.

CERTIFICATION CEREMONIES

Mihail Kogălniceanu Air Base hosted the certification ceremonies for the British and Finnish detachments. These ceremonies marked the official readiness and operational capability of the units to undertake their respective missions. Both the Finnish and British fighter jets also participated in Allied training activities, assurance measures, and combined joint maneuvers in the region and beyond. They also launched sorties in support of NATO's major Integrated Air and Missile Defence live-firing exercise Ramstein Legacy, conducted in Romania and Bulgaria with sixteen participating Allies.

"Having the Finnish detachment deploy to Romania a bit over a year after Finland became a NATO member, together with the Royal Air Force, is a crystal clear message that we stand together as Allies"



In a ceremony hosted by Romania on April 9, RAF 140 Expeditionary Air Wing received their mission-ready certification from Brigadier General Paulo Costa, Director of the Air Operations Centre at NATO's Southern Combined Air Operation Centre in Torrejón, Spain. Photo by Alexandru Aioanei

In a ceremony hosted by Romania on June 11, CAOC Torrejón Deputy Commander, Brigadier General Avraam Kazantzoglou, presented the mission-ready certificate to the Finnish Detachment Commander Lieutenant Colonel Rami Lindström. Photo by Bogdan Pantilimon





ΗΝΙΟΧΟΣ 2024



On Thursday, April 18, 2024, the Multinational Air Exercise INIOCHOS 2024, which started on Monday, April 8, 2024, was completed. The main host unit for the exercise was Andravida Air Base, from where nearly all the foreign fighter aircraft and the majority of Air Force (AF) fighters operated. In INIOCHOS 2024, a total of nine countries participated, marking the largest number of Air Force participants since the exercise's establishment as INVITEX. Specifically, France participated with RAFALE and AEW E-3F aircraft, the UK with TYPHOON aircraft, the USA with F-16s and MQ-9 Unmanned Aircraft, Spain with F-18s, Qatar with RAFALEs, the Republic of Cyprus with an AW-139 helicopter, Montenegro with a B-414

helicopter, Romania with F-16s, and Saudi Arabia with TYPHOONs, completing 1,027 sorties within the entire Athens FIR. Additionally, forces from the Army, Navy, and Special Warfare Command participated, along with Austria and Portugal, which contributed intelligence and Special Forces personnel to create complex and realistic scenarios. Germany participated with an observer team. During INIOCHOS 2024, all types of air missions were conducted under an intense battle rhythm, day and night, covering the full spectrum of modern air operations in a series of highly realistic and complex scenarios.

Source: Hellenic Air Force

Romanian F-16 flight through low terrain during the Live-fly training exercise. Photo by: Anton Balakchiev



F-16 AIRCRAFT FROM NORWAY RECEIVED AT CÂMPIA TURZII

On Friday, April 19, three F-16 Fighting Falcon aircraft from Norway landed at the 71st Air Base "General Emanoil Ionescu" in Cămpia Turzii. These aircraft are designated for the 48th Fighter Squadron.

This acquisition, which includes a package of associated goods and services, aims to enhance Romania's security. The new F-16s will support national and NATO airspace defense, both in peacetime and during crises, through the Permanent Combat Service – Air Police (SLP-PA) under NATO command.

"With the gradual arrival of 32 multirole F-16 Fighting Falcon aircraft over this and the next year, which will equip two more squadrons of the Air Force, Romania is bolstering its air defense capabilities to a level suited to the regional security challenges. These aircraft will play a crucial role in maintaining a credible allied defense posture and deterring any aggression on the eastern flank. Equally important, they will facilitate the transition of

our air forces to the fifth generation – the acquisition of F-35 aircraft," stated the Minister of National Defense, Angel Tîlvăr.

This is the second batch of three F-16 aircraft purchased by Romania from the Kingdom of Norway, with the first batch being received at the end of November 2023 at the 86th Air Base "Lieutenant Aviator Gheorghe Mociorniță" in Borcea.

Under the Concept for the Gradual Achievement of Air Defense Capability, within the "Air Force Multirole Aircraft" program, the Romanian Government awarded the contract for the acquisition of 32 F-16 aircraft to the Norwegian Government. This contract includes initial logistical support and a complementary package of goods and services (from the United States Government).

The aircraft will be delivered in operational condition, with available resources ensuring their operation for a transition period of at least 10 years, towards fifth-generation aircraft. This acquisition of Norwegian fighter aircraft thus represents a capability transfer between two NATO allied countries.

The aircraft will meet NATO's new requirements and will be introduced into a modernization program to match the configuration (M6.X) of the F-16 aircraft already in service with the Romanian Air Force. This solution ensures the involvement of the national defense industry in the maintenance and modernization of the F-16 aircraft through the Aerostar Bacău company.

Currently, the Romanian Air Force operates 20 F-16 aircraft acquired under the Concept for the Gradual Achievement of Air Defense Capability within the "Air Force Multirole Aircraft" program.

Story by Romanian National MoD

Three Norwegian F-16 aircraft, tail numbers 1622, 1628 and 1629 have been transferred to Romania and have departed from Rygge Air Station. Photo by Onar Digernes Aase / Forsvaret



The three ROU AFF-16 aircraft in their shelters at Cămpia Turzii. Photo by Alexandru Aioanei / ROU AF



HELLENIC AIR FORCE TEAMED UP WITH US BOMBER TASK FORCE

On April 2, 2024, Hellenic Air Force F-16 jets conducted joint training with a U.S. Air Force B-1B bomber over the Mediterranean Sea. A combined training called "Onyx Dive" took place in the Athens Flight Information Region, enabling integration maneuvers bolstering flying skills and interoperability of Allied air forces.

Eight Hellenic Air Force F-16 fighter aircraft participated in the joint training, escorting a B-1B strategic bomber and practicing aircraft aerial drills. The purpose of the joint training was to increase operational readiness, interoperability, combat capability, as well as to further upgrade the military cooperation of the two Air Forces. Bomber Task Forces provided U.S. and NATO leaders with strategic options to assure, deter, and defend against potential adversary aggression throughout Europe. The regular deployment of U.S. strategic bombers to Europe demonstrated the strong transatlantic link in NATO and underlined the solid commitment to deterrence and defense in the Euro-Atlantic area.

U.S. AIR FORCE B-1B BOMBERS CONCLUDED COMBINED DRILLS WITH ALLIES

During a month-long deployment, which kicked off on March 24, U.S. Air Force B-1Bs and supporting personnel conducted several missions to train alongside Allies and partners across the European region, including above the Czech Republic, Greece, Türkiye, and the United Kingdom.

U.S. Air Force B-1B Lancers assigned to the 9th Expeditionary Bomb Squadron returned to Dyess Air Force Base, Texas, on April 23, as they concluded Bomber Task Force 24-2, which saw them operate out of Morón Air Base, Spain. During their deployment in Europe, the bombers integrated with Typhoons from the United Kingdom and conducted escort training with their Allies before leaving the theatre.

"This deployment was another excellent opportunity for U.S. forces to demonstrate our ability to operate in conjunction with our Allies and partners to enhance our combined strength," said General James Hecker, commander of U.S. Air Forces in Europe – Air Forces Africa and NATO Allied Air Command. "It's critical to bolstering our extended deterrence and defense network and capable of decisively meeting the security

challenges of today and tomorrow," he added.

Through these missions, the United States enabled dynamic force employment in the European theatre, providing strategic predictability and assurance for Allies and partners, while contributing to deterrence by introducing greater operational unpredictability for potential adversaries. Bomber Task Force missions underscored the transatlantic link within the Alliance.

"To uphold stability worldwide, it is imperative to have a force proficient in operating across multifarious domains," said Lt.

Col. Ryan Stillwell, 9th EBS commander. "The Agile Combat Employment framework in partnership with our Allies aims to form an integrated unit, poised and equipped to swiftly counter any adversary aggression."

BTF 24-2 was a routine part of Large-Scale Global Exercise 2024, an umbrella term that incorporated dozens of separate exercises and military activities under multiple combatant commands, enabling the U.S. Joint Force to train with Allies and partners and improve shared understanding, trust, and interoperability on security challenges across the globe.

U.S. ground crew prepares to complete post-flight maintenance on a B-1B Lancer on the flightline at Morón Air Base, Spain, during Bomber Task Force Europe April 19, 2024. U.S. Air Force photo by Holly Cook



Allied Nations participated in NATO's first major joint exercise for the multi-domain Allied Reaction Force (ARF), exercise **Steadfast Deterrence 2024**, from May 21 – 30, 2024. Participants from NATO's 32 Allies took part in the exercise, demonstrating NATO cohesion and sharing best practices. In real time, NATO conducted a plethora of vigilance and deterrence activities.

Sponsored by Supreme Headquarters Allied Powers Europe (SHAPE) and directed by the Joint Warfare Centre (JWC), **Steadfast Deterrence 2024** was a non-Article 5 major joint exercise, designed to train and certify NATO Rapid Deployable Corps Italy as the first Allied ARF Headquarters, which will be effective from July 2024.

The exercise tested NATO's responsiveness, deterrence posture, and adaptation of command and control capabilities in a highly complex multi-threat environment.

It provided a unique opportunity to explore the ARF concept for the first time. "NATO AIRCOM worked alongside other NATO commands across Europe and the Atlantic area of responsibility to practice simulated deterrence activities," said Brigadier General David Morpurgo, Joint Force Air Component Director.

"Participants from NATO's 32 Allies took part in the exercise, demonstrating NATO cohesion and sharing best practices. In real time, NATO conducted a plethora of

FIRST TEST FOR THE ALLIED REACTION FORCE IN NATO EXERCISE STEADFAST DETERRENCE 2024

vigilance and deterrence activities 24/7/365 to keep all Allies safe," he added.

From several locations, over 100 Allied Air Command personnel participated in the exercise, which was based on the simulated but highly realistic new "360-degree Multi-Domain Setting." This operationalized NATO's Deterrence and Defence of the Euro-Atlantic Area (DDA) concept and reinforced the new regional deterrence and defence plans in all domains.

The establishment of the multinational and

multi-domain ARF resulted from decisions taken at the 2023 Vilnius Summit. ARF is a crucial component of the new NATO Force Model, providing a larger pool of high-readiness forces across the five domains of land, sea, air, cyberspace, and space.

ARF will replace the NATO Response Force towards the end of 2024, being vastly larger in scale, scope, and operational readiness for the defence of the Alliance, ensuring that NATO is ready to respond to any threat to security.

ALLIED AIR FORCES MADE MAJOR CONTRIBUTION TO JOINT COMBINED NEPTUNE STRIKE MISSIONS

Allied fighter jets and refueling planes flew hundreds of sorties in support of NATO's Neptune Strike enhanced Vigilance Activity, showcasing the collaboration, professionalism, and interoperability of Alliance forces working together in multi-domain and joint operations.

Neptune Strike provided NATO an excellent opportunity to train its air and naval fleets across large distances, ensuring that Allied forces maintained the highest level of readiness to work together to defend Allied territory. The first iteration of Neptune Strike in 2024 visibly demonstrated NATO's ability to cooperate and integrate effectively. The maneuvers centered around the five Carrier Strike Groups of the French Charles de Gaulle, the Spanish Juan Carlos I, the Italian Cavour, the Turkish Anadolu, and the United States Eisenhower aircraft carriers or amphibious assault ships deployed and operating in the Mediterranean. The strike groups were joined by other Navies' ships, e.g., from Albania and North Macedonia, making Neptune Strike 24-1 proof of the strong cohesion and trust between North American and European Allies.

Since April 26, besides carrier-generated sorties in the Mediterranean, NATO conducted several flying drills under Neptune Strike in and around the Baltic Sea and Eastern Europe. Allied fighter jets from Finland, Germany, Italy, Poland, Portugal, and Spain joined these maneuvers. While Allied fighters and air-to-air refuelers supported simulated long-range maritime strikes and Air-Land Integration with Joint Terminal Attack Controllers in the south, they flew similar missions and combined air operations in the north.

"Neptune Strike was an excellent opportunity for NATO to train its air and naval fleets across large distances, ensuring that Allied forces maintained the highest level of readiness to work together to defend Allied territory," said Lieutenant Colonel Rodolphe, head of the Neptune Strike execution team at Allied Air Command.



NATO jets and vessels participating in the enhanced Vigilance Activity Neptune Strike 24-1 across Europe; this is an excellent opportunity for NATO to train its air and naval fleets across large distances ensuring that Allied forces maintain the highest level of readiness to work together to defend Allied territory

Neptune Strike also offered valuable joint training opportunities for various fighter squadrons deployed to Air Policing missions on the eastern flank.

NATO is a defensive alliance of 32 nations committed to safeguarding the collective freedom, security, and sovereignty of all Allies against all threats. Regularly conducted military exercises enhance Alliance security by maintaining NATO's high level of readiness to meet any threat. In this context, Neptune Strike (NEST) was a multi-domain and multi-national enhanced vigilance activity, an unscripted maritime exercise that honed NATO's ability to integrate maritime capabilities, including carrier strike groups, to support Allied defense.

The Portuguese Air Force hosted two simultaneous live-flying exercises at Beja Air Base from May 22 to June 5. The high-level tactical air exercise REAL THAW 2024 and the helicopter exercise HOT BLADE took place during this period. RT24 and HB24 played complementary roles in enhancing joint and combined interoperability among participating nations. RT/HB 2024 took place at Airbase 11, Beja, where the majority of the assets were based. The missions were flown from Airbase 11, simulating a Deployable Operating Base, towards assigned airspace. Air operations were mainly developed in the Southwest part of Portugal.

The objective of REAL THAW / HOT BLADE 2024 was to provide adequate tactical training to all participating units, enabling them to work in a highly collaborative manner, sharing tactical knowledge, in a multi-domain environment to achieve the full potential of the participating units. "Both traditional exercises put into practice the tactics,

techniques, and procedures of Portuguese armed forces and participants from international forces, enhancing interoperability and multi-domain operation skills," said Major Cláudio "IPod" Peixeiro, the officer who coordinated exercise activities at Beja. "The Portuguese Air Force conducted exercise Real Thaw annually. The scenario created a

PORTUGAL HOSTED MULTINATIONAL AIR EXERCISES AT BEJA



LEFT: more than 100 spotters traveled to Air Base No. 11 (BA11), in Beja, to photograph some of the aircraft participating in the RealThaw and HotBlade 2024 multinational exercises. On the "Spotters Day" the Portuguese aircraft KC-390, AW119 Koala and EH-101 Merlin took off from BA11, in addition to aircraft from the other participating countries, such as the French Mirage 2000 and E3-F, the Romanian F-16MLU and C-27J, the Danish C-130J, the Austrian AB212, the Swiss AS532 and the L-159 from the Czech Republic



theatre-realistic operational environment for combined joint missions at the tactical level," he continued. "Participants worked on integration, interoperability, and training in large force packages to achieve mission accomplishment with maximum safety and efficiency," he added.

REAL THAW 2024 (RT24) was a Portuguese training exercise scheduled and conducted by the Portuguese Air Force (PRTAF), planned as a Large Force Employment (LFE) Exercise in a multi-domain framework. At the same time, the PRTAF, in coordination with



"Forțele Aeriene Române" Vipers and "Armée de l'Air et de l'Espace" Mirage. During the exercise, NATO techniques, tactics, and procedures were practiced, along with active participation in the preparation and execution of joint air missions with allied partners

Romanian Air Force (ROUAF) detachment consisting of approximately 35 military personnel and 3 F-16MLU aircraft from the 86th Air Base Borcea was deployed on May 20 to Beja Air Base, Portugal. Additionally, a C-27J Spartan aircraft with aircrew, technical-engineering personnel, and specialists from the 90th Air Transport Base Otopeni participated in the multinational exercise Real Thaw



the Multinational Helicopter Training Centre (MHTC), planned and conducted HOT BLADE 24 (HB24), designed to allow European helicopter crews to participate in a Large Force Exercise on a vast range of battlefield missions. Hot Blade 2024 was a helicopter exercise organized by the Portuguese Air Force under the new umbrella of the Multinational Helicopter Training Centre based at Sintra Air Base. "Designed in synergy with Real Thaw at Beja Air Base, exercise Hot Blade 24 aimed to increase the interoperability of helicopter operations among participants, exposing them to a complex operational environment where they could train and prepare for current theatres of conflict and humanitarian support

missions," Peixeiro added. In this year's combined edition of Real Thaw and Hot Blade, there were day and night flying windows dedicated to specific package tactics development and training involving fighter jets, transport aircraft, and helicopters. Additionally, at least one flying window per day was committed to Composite Air Operations type missions, providing an extra layer of complexity in coordinating and integrating the requirements and objectives of the different packages to ensure mission success.

Story by Adrian Sultănoiu based on information provided by ROUAF and PRTAF Public Affairs Offices Photos courtesy by Força Aérea Portuguesa

AIR DEFENCE EXERCISE MALLET STRIKE 24-1



A German PATRIOT firing unit deployed to Finland to integrate with a Finnish brigade during exercise Mallet Strike 24-1, focusing on training tactics, techniques, procedures, and Command and Control structures.

Exercise Mallet Strike concluded after ten days of binational integrated air defense drills involving almost 1,500 soldiers from the Finnish Armed Forces and a 120-strong German PATRIOT firing unit.

"We successfully conducted a combined sea and road move from Germany to Finland, deploying 50 vehicles and 40 trailers over 1500 kilometers to an assembly area in the Lohtaja Military Training Area," said Lieutenant Colonel Christoph Schmalzer, Commander of the German PATRIOT detachment. "We ran system and connectivity tests with our equipment to ensure communication with our Finnish colleagues. Over the weekend, we moved to the firing positions and began operating under Finnish Command, marking the first NATO Ally's participation in this Finnish exercise, conducted since 1952," he added.

"This exercise is conducted twice a year, in spring and fall, combining live firing and live flying drills," said Colonel Mano-Mikael Nokelainen, Finnish Inspector of the Ground Based Air Defence Forces. "Participants from all services—and now for the first time from our Ally Germany—collaborated to repel

simulated enemy air attacks, including in an electronic warfare environment," he added, emphasizing that the exercise prepares all GBAD operators across the whole chain of command for their wartime mission of defending.

The German 120-strong PATRIOT unit was fully integrated into exercise Mallet Strike, working with up to 1700 participants from the Finnish Defence Forces. Embedded in the NATO Integrated Air and Missile Defence System via the Finnish Control and Reporting Centre, the German unit contributed to the Recognized Air Picture and practiced engagement operations against drones and aircraft acting inside a joint combined Missile Engagement Zone. The collaboration of Finnish and German GBAD demonstrated NATO's cohesion and capabilities and underscored how Allied forces are integrated by design. Conducting combined exercises honed cooperation and

interoperability among Allies, which are essential for meaningful deterrence and defense.

For the first time since Finland joined NATO in April 2023, the armed forces of Finland and Germany trained together, practicing surface-based air defense during the Finnish-led exercise Mallet Strike. A key objective was to enhance interoperability and integration of the German PATRIOT unit with Finnish NASAMS (National Advanced Surface to Air Missile System). The authority over the German unit was transferred to the Finnish Army, increasing the effectiveness of training and practicing communication structures and chain of command.

"We aimed to showcase our national solution for defending our country, our air defense systems, conscripts, the way we train and fight, and what we can bring to NATO," explained Colonel Mano-Mikael Nokelainen, Finnish Inspector of the Ground Based Air Defence Forces. "I hope and believe our German friends learned something from us—we definitely learned from them," he added.

This type of binational live exercise supported achieving common and individual exercise objectives, including various elements of air operations such as reconnaissance, electronic warfare, and defense against airborne threats by surface-based or maritime systems.

"I am so proud that together with our Finnish Allies, we made a decisive contribution by participating in this exercise to advance interoperability and deepen integration between our PATRIOT and Finnish ground-based air defense systems," said Colonel Alexander Zoklits, Commodore of the German Surface-to-Air Missile Wing 1. "In doing so, we made an important contribution to strengthening NATO's integrated air defense, providing credible deterrence and increasing the Alliance's defense capability," he added. Interoperability enabled Allied forces to act together coherently, effectively, and efficiently to achieve tactical, operational, and strategic objectives. It is essential for all operations involving NATO Integrated Air and Missile Defence and requires a high degree of coordination.

A German PATRIOT and a Finnish NASAMS launcher lined up during exercise Mallet Strike 2024 demonstrating readiness and interoperability among NATO Air Defence forces.
Photo by Martin Hoenig



Finnish Army Air Defence forces training during Mallet Strike 2024 showing the national solution to defending the country against threats from the air.
Photo courtesy Finnish Army



ASTRAL KNIGHT 24: ALLIED NATIONS PRACTICE COLLECTIVE DEFENCE CAPABILITIES



From May 6 to 16, 2024, Allied Nations gathered across three operating bases in Lithuania, Poland, and Romania for Astrak Knight 2024, a U.S.-led multinational exercise. The event featured 5,000 personnel and over 50 aircraft from six Allied nations, focusing on the development and employment of Integrated Air and Missile Defense (IAMD) architecture.

The exercise included live flying and simulated combat scenarios primarily in Poland and the Baltic States. General James Hecker, NATO Allied Air Command commander, emphasized the importance of the exercise: "Astrak Knight demonstrates the collective defense capabilities of NATO Allies across Europe. By fostering early collaboration and integration in air and missile defense efforts among NATO nations, we enhance our ability to deter and respond effectively to shared threats."

Astrak Knight provides an

opportunity for Allies to test IAMD systems, assets, and capabilities, while exercising defense plans for distributed air operations through the Agile Combat Employment concept. Later this year, Allied Air Command will conduct the NATO Ramstein Flag exercise series at Andravida Air Base in Greece, further developing IAMD concepts and demonstrating NATO's defense against current and future threats.

IAMD is a collaborative effort and a key pillar of NATO's collective defense, ensuring the safety of Allied populations while

promoting regional security and stability. The NATO IAMD system integrates national and NATO systems of sensors, command and control assets, and weapons systems, prepared to address the full spectrum of threats across NATO territory.

Astrak Knight 2024, focused on exercising IAMD and enhancing theater-wide security capabilities, hosted nearly 5,000 Allied personnel and over 50 aircraft from Lithuania, Poland, the U.K., and the U.S. Denmark and Greece also participated, advancing Allied interoperability in the Baltic regions. General Hecker reiterated the significance of early collaboration in IAMD efforts to enhance deterrence and response capabilities.

The exercise highlighted the importance of quickly detecting

and responding to aerial threats, as evidenced by recent conflicts in Ukraine and Israel. Participating nations focused on movement, maneuverability, and integration between U.S. and Allied forces, practicing Agile Combat Employment tactics. The U.S. investment in advanced sensors, radars, and surveillance technologies, integrated with Allies, provided a comprehensive situational awareness picture, essential for detecting, tracking, and identifying airborne and missile threats.

Collaboration in exercises like Astrak Knight strengthens collective defense capabilities across Europe, enabling participants to test command and control relationships and effectively deter and respond to threats.

A Lithuanian NASAMS short- to medium-range ground-based air defence system during a static display at Šiauliai. NASAMS can be used to protect air bases against threats from the air.
Archive photo by Manfred Reudenbach



U.S. Army PATRIOT Missile Systems participated in DEFENDER-Europe 21, associated with exercises Astrak Knight 21 positioned in Croatia.
U.S. Army archive photo by Alexandra Shea



74th PATRIOT REGIMENT ACHIEVED KEY MILESTONE WITH SUCCESSFUL SECOND BATTERY CERTIFICATION

In April, the 74th PATRIOT Regiment reached a crucial milestone by completing the final evaluation of the PATRIOT battery as part of the TAFT (Technical Assistance Field Team) training program. After six months of intensive preparation under military supervision, the team demonstrated competence and professionalism in operating the PATRIOT equipment, in line with NATO standards. The evaluation followed a very strict training schedule, where any human error would have been inexcusable and could have led to the failure of the evaluation. The participating soldiers demonstrated excellent communication and successfully formed a cohesive team, working in perfect harmony. For optimal results, all soldiers were present for the six-month program without exception, as the absence of any member would have created a gap in the chain of exercises. Throughout this program, each soldier had the opportunity to improve their knowledge and skills. Second Lieutenant Lavinia Ștefan emphasized the importance of this thorough training: "Since October, I have been working in the TAFT training program, one of the most

important as it targets the meticulous preparation of both individual soldiers and the collective units within the PATRIOT subunits. We have improved our knowledge of the equipment and its operation, putting it into practice through weekly deployment exercises in designated areas. By the end of the course, there is a remarkable difference compared to when we started." The final evaluation, according to Table 8 of standards and requirements, was a complex and rigorous test of the team's abilities. Captain George Bîndar described the details of this crucial stage: "What does this evaluation entail? It encompasses all activities carried out by the operating teams from receiving the movement order to reporting 'Ready to fight'. The activities include receiving the movement order, conducting reconnaissance, validating the PATRIOT battery, conducting information briefings and safety training, transitioning equipment to march position, executing the march, deploying the equipment, and initializing the system. Each of these activities is carefully analyzed in terms of adherence to established time frames, as

well as personnel and equipment safety measures." The evaluation results were impressive, reflecting the collective effort and perfect synchronization of the operating teams. "Reaching this moment required nearly six months of collective work. I am proud to be part of this team, which achieved very, very good results today!" concluded Captain George Bîndar. The success of this evaluation not only certifies the 74th PATRIOT Regiment for operating the equipment to NATO standards but also strengthens Romania's position within the alliance, demonstrating the commitment and capability to maintain high standards of military training and operation. This event marks an important step in the professional development of the involved soldiers and contributes to the enhancement of national and regional security.

*Story by Maria Ioniță
Photos by Alexandru Nițu*



Second Lieutenant Roman Andrada expressed his pride in his team's achievements: "Today was a significant day for the 74th PATRIOT Regiment as we passed the final assessment to be certified to operate the equipment to NATO standards. The most crucial aspects learned during the six months were safety protocols and system maintenance checks. We were on time and achieved an excellent score in the final assessment."



Precision, attention to detail, and coordination are fundamental elements for flawlessly executing the exercise. Teamwork is crucial to ensuring these elements come together seamlessly



RAMSTEIN LEGACY 24

"Ramstein Legacy is NATO's capstone IAMD exercise. It enables Nations across the Alliance to test command and control, airborne early warning and conduct of air defence system weapon firing" – Air Marshal Johnny Stringer, Deputy Commander of NATO's Allied Air Command

Allied Surface-Based Air and Missile Defence (SBAMD) units and fighter jets came together in Romania and Bulgaria to exercise Integrated Air and Missile Defence (IAMD) tactics from June 3 - 14, 2024. Ramstein Legacy was Allied Air Command's principal IAMD exercise, aimed at strengthening cooperation, interoperability, and integration of NATO air defence forces into the NATO common air defence command structure.

An important objective for the Romanian Air Force during the exercise is completing the operationalization process for the second PATRIOT system. Through live-fire exercises at the Capu Midia range, this system will be certified as "mission capable."

"Since Russia's illegal invasion of Ukraine, there has been an increased use of missiles, Unmanned Aerial Vehicles (UAVs), and combat aircraft close to the borders of NATO nations. Large-scale training exercises like Ramstein Legacy have become more important to NATO than ever; the scenarios provided the opportunity to enhance our integrated approach, multi-domain interoperability, and unit readiness," said Brigadier General Michael Krah, Deputy Chief of Staff Operations at Allied Air Command, who oversaw all operational matters of allied air forces.

NATO members Bulgaria, Romania, Czechia, Finland, France, Germany, Greece, Hungary, Italy, Lithuania, Poland, Portugal, Slovakia, Slovenia, Türkiye, and the United Kingdom participated with SBAMD units and fighter aircraft to provide a theatre-realistic scenario and enabled fully integrated combined joint training of this important collective capability. Estonia, Spain, and Sweden participated as observers during RALY 24. Under the overall control of a Joint Force Air Component at Ramstein, Germany, NATO AWACS aircraft from Geilenkirchen, Germany, TUR E-7T aircraft from Konya, Türkiye, the Combined Air Operations Centre at Torrejon, Spain, and Bulgarian and Romanian Control and Reporting Centres ensured coordinated training inside a Joint Engagement Zone.

NATO members Canada, the Netherlands, Spain, and the United States, as well as NATO agencies (Joint Air Power Competence Centre, Competence Centre for Surface-Based Air and Missile Defence, Integrated Air and Missile Defence Centre of Excellence, and the NATO Communications and Information Agency), provided their Subject Matter Experts to support Exercise Control.

"We aimed to exploit Ramstein Legacy to deliver

much-needed tactical-level training for deployed SBAMD forces, fighter aircraft, and controllers; through training our reporting procedures and coordinating assets, we contributed to NATO's deterrence and defence posture, demonstrating we have the capability to timely deploy and integrate NATO forces," said Major Tomas Kurpas from the Ramstein Legacy planning team at Allied Air Command training and exercise division.

The exercise combined Command and Control components with NATO Airborne Warning and Control System support, national airborne Air Defence, and SBAMD Forces to exercise NATO Tactics, Techniques, and Procedures in a realistic multi-domain scenario. Embedded in Ramstein Legacy, deployed troops conducted Counter-small Unmanned Aerial System (C-sUAS) training. By way of experimentation, the U.S. Joint C-sUAS Office (US JCO), in cooperation with NCIA, introduced these defensive operations into a bigger NATO exercise.

The NATO IAMD system is a collaborative effort and a key defensive component of the Alliance's Joint Air Power, which aims to ensure the stability and security of NATO airspace.

Later in the year, Allied Air Command and Host Nation Greece were scheduled to conduct the first iteration of the NATO Ramstein Flag exercise series at Andravida Air Base in Greece. This exercise was planned to build on Ramstein Legacy concepts, incorporating Counter-Anti Access/Area Denial tactics to further demonstrate NATO defence against current and future threats, while continuing to promote regional security and stability.

Photo courtesy by Romanian, Bulgarian and Turkish Air Force, German SAM Wing 1



Integration during Ramstein Legacy 2024 static display - a Romanian and a German PATRIOT launcher next to a German radar unit



Romanian Air Force PATRIOT live firing in Capu Midia Range



Opening ceremony



Live firing in Shabla Range, Bulgaria



Slovenian team with SA-24 in Shabla Range, Bulgaria



Turkish Air Force E-7T



More than 5,000 troops and 320 pieces of equipment from seven allied and partner states participated from May 5 to 24 in the SWIFT RESPONSE 24/DEFENDER 24 Multinational Exercise conducted in Romania by the U.S. Army Europe and Africa (USAREUR-AF). Romania's participation included 2,300 soldiers and 220 pieces of equipment.

SWIFT RESPONSE 24 was an airborne exercise, with a scenario that involved regaining a military base under belligerent occupation through a Joint Forcible Entry of 2,000 troops, gaining air superiority, and conducting live firing exercises (LIVEX) in a training range. The exercise was planned and led by the German Armed Forces alongside the Romanian Land Forces and supported by the Romanian Air Force.



U.S. AND NATO DEMONSTRATE CAPACITY DURING EXERCISE SWIFT RESPONSE



ABOVE: U.S. Army paratroopers assigned to the 82nd Airborne Division conduct a joint forcible entry (JFE) during Swift Response 24 at Luna, Romania, on May 13, 2024. U.S. Army photo by Spc. Ashley Xie

LEFT: German Soldiers conduct air assault operations from a German NH90 helicopter during the joint Romanian-US military operation, Swift Response 24, Cincu, Romania, May 15, 2024. U.S. Army photo by Staff Sgt. Ashley Low

Within the framework of NATO's ongoing Steadfast Defender 24 series of exercise, forces from the France, Germany, Hungary, the Netherlands, Romania, Spain and United States participated in these air mobility demonstrations involving several thousand paratroopers jumping from U.S. C-17 as well as French and German A400M cargo aircraft. The main sequences of the exercise were conducted at the 71st "General Emanoil Ionescu" Air Base in Câmpia Turzii, Bogata Firing Range in Turda, Getica National Combat Training Center in Cincu, and Știuca Firing Range in Știuca Communal Settlement. Additional sequences took place at the 90th "Comandor aviator Gheorghe Bănculescu" Air Base in Otopeni, Aurel Vlaicu Aviation Personnel Training and Education Air Base in Boboc, and Banat Airport in Caransebeș. Personnel and equipment convoys began heading towards the aforementioned training facilities on Tuesday, April 30, on various national roads, accompanied by Military Police crews. SWIFT RESPONSE 24 was led by the United States Army V Corps (Fifth Corps) and consisted of joint airborne operations to increase readiness and interoperability among NATO allies, while contributing to allied defense and deterrence efforts. The exercise involved approximately 3,650 U.S. troops and 9,500 troops from allied and partner states, starting with Joint Forcible Entries (JFEs) and airborne operations. SWIFT RESPONSE 24 was linked to the national exercises QUADRIGA SOUTH in Germany, DACIA 24 in Romania, and SPRING STRIKE in Sweden. DEFENDER 24 Training Platform, consisting of Exercises SABER STRIKE 24, IMMEDIATE RESPONSE 24, and SWIFT RESPONSE 24, was planned by the United States European Command (USEUCOM) and led by United States Army Europe and Africa (USAREUR-AF). The exercise took place between March 28 and May 31, involving more than 40,000 troops from 20 allied and partner countries, making it the largest US military exercise conducted in Europe. It aimed at increasing allied training and strengthening the Alliance's defense capability, linked to the NATO-led STEADFAST DEFENDER 24 Exercise. The maneuvers demonstrated NATO members' collective capabilities to swiftly respond to an attack on an Ally. Through rapid and massive force projection employing several Allies' aircraft and Special Forces, the exercise simulated the protection of NATO territory on the eastern flank. The drills involved inserting these forces behind enemy lines to effectively prepare and support defensive operations. In total, 13,000 airborne troops participated in the month-long exercise, conducted from the Baltics to the Balkans. Exercise Swift Response 24, a U.S.-led exercise, aimed at showcasing U.S. capabilities and cooperation with NATO Allies, was linked to NATO's Steadfast Defender, demonstrating the Alliance's determination and capacity to implement and execute deterrence and defense across the Euro-Atlantic area.

The combined joint training activities validated that the Allies possess the capacity to execute Joint Forcible Entry operations and are able to decisively maneuver and gain advantage in a dynamic security environment. The U.S. routinely and regularly conducts exercises with European Allies. The main objectives of these exercises are to enhance interoperability among Allies, improving joint operational capability across a variety of mission sets.

Source: Romanian National MoD



ABOVE: French Army paratroops in front of a French Air Force A400M ready to embark the plane for an airdrop over Romania during exercise Swift Response 2024.

Photo courtesy French Air and Space Force
BELOW: U.S. C-17 Globemaster IIIs prepare to take off during exercise Swift Response 24 at Aviano Air Base, Italy, May 7, 2024. The deployment was conducted as an agile combat employment enabling U.S. forces in Europe to operate from various locations. Photo by Joseph Bartoszek.



Swift Response 2024 exercise participants familiarize themselves with partner Nation aircraft during a Joint Forcible Entry operation, 71st Air Base near Turda, Romania, May 14, 2024. Swift Response 24 is a dynamic U.S. Army Europe & Africa led exercise focused on Allied airborne forces' ability to quickly and effectively respond to crises as an interoperable, multi-national team. U.S. Army photo by Staff Sgt. Ashley Low



ITALIAN AIR FORCE PHASE OUT VELIVOLO AMX

Gian Carlo Vecchi

Gian Carlo Vecchi, Pier Paolo Lazzarin



On 5 April 2024, the Air Force officially said goodbye with an official ceremony to the AMX aircraft which had reached the end of its operational life after 35 years of intense activity. This aircraft operated both in Italy and abroad, becoming - among other things - the aero-tactical jet aircraft most used by the Air Force in missions outside national borders and its last flight was the transfer from the airport of Istrana, home of the 51st Wing at Piacenza airport, where it seems that at least two examples will be kept in flight conditions, or at least will not be definitively decommissioned.

Passage in formation for the five AMXs, united with the Frecce Tricolori, for their last farewell to the public and military honors

Afghanistan, 2011: Low pass by this AMX of the 'BLACK CATS' Task Force with the reconnaissance pod



After the technical intervention of Updating Operational and Logistics Capabilities (ACOL), the aircraft was now designated A-11B for the single-seat version and TA-11B for the two-seat version.

The AMX is an aircraft whose main use was reconnaissance and tactical support (CAS Close Air Support), better known as "GHIBLI" or affectionately called "TOPONE" by pilots and specialists, it entered the forces of 'Aeronautica Militare in 1989, replacing the elderly G.91Y, and was initially highly criticized both for the limited avionics suite and for the engine which had always been considered too old and underperforming. After a troubled operational start which saw the fleet grounded twice (in 1991 and 1996),

the AMX underwent a real operational turning point after the ACOL update implemented only for part of the line, most precisely for 43 A-11A and 10 TA-11B. The ACOL upgrade eliminated what was the main problem of the AMX, namely the limited operational capacity of the weapon system.

We intervened with a program started in 2003 and concluded in 2012, (the first AMX ACOL was delivered to the operational departments in August 2007) focused on the introduction of an inertial navigation/GPS system, the updating of the communication systems and Friend/Foe identification like NGIFF (New Generation Identification Friend or Foe); all cockpit

panels on single-seat aircraft have been made compatible with the pilot's use of night vision systems (NVG) and, to allow the pilot to effectively manage the new operational capabilities, the cockpit has been updated with a modern multifunction color LCD display, supported by a powerful Computer Symbol Generator (CSG) with Digital Map functions.

The upgrade also included the integration of precision armaments, and two interventions in particular have enormously expanded operational reconnaissance and air-to-surface attack capabilities. As regards the first, the very high performance RecelLite digital pod was introduced, capable of acquiring and

Landing of the first AMXs after the transition into formation resumed on April 5th, the official day of the phase-out



An AMX/T of the 101st flight group has finished refueling in flight and comes alongside to take some images during the refueling of the other two AMXs

transmitting photographs and videos in real time via broadband digital datalink. For the second capacity, the Litening pod was implemented for the use of high-precision ammunition with both inertial and laser guidance and with a double capacity in both cases, i.e. being able to transmit what is seen on the ground to show troops supported what is happening around the area of interest thus significantly increasing Situational Awareness (A definition of Situational Awareness is "possession of a clear and correct perception of what has happened, what is happening and what may happen in the immediate future"). All this information is or can be provided in real time to a ROVER located on the ground

connected via data link.

The ACOL upgrade brought the AMX to a fully mature operational standard, greatly expanding the aircraft's operational capability, a standard that continued until its decommissioning. Over the years the Air Force in its rationalization program has concentrated all the AMXs on the Istrana base, and in July 2014 the 101st OCU Group was also transferred from Amendola to the Istrana base which operated with three flight groups of AMX (the 103rd, the 101st and the 132nd); this until 2016, when the 103rd Group and the 101st Group OCU were placed in the "Quadro" position (deactivated). Moving on to the main operational

scenarios in which it was the protagonist, the AMX was used in a limited manner in the Balkans, in Operation Deliberate Force in 1995 (not yet in the ACOL version), and in Bosnia and Kosovo in 1999. Subsequently, the aircraft participated in Unified Protector in Libya, with the Air Task Group "Birgi" established on the airport grounds of the 37th Wing of Trapani, with flight, technical, specialist and maintenance personnel, totaling a total of over 500 hours of flight and a few hundred missions, with excellent results in all respects.

For the mission in Kuwait, "Inherent Resolve" - "Prima Parthica", in June 2016 the AMXs of the "Task Group Black Cats" replaced the Tornados of the "Devil" Task Group of the 6th

Group photo for pilots and passengers of the formation flight, among them the chief of the staff Gen SA Luca Goretti (third from left) and the commander of the 51st Wing Col. Emanuele Chiadroni (fifth from left)



Wing and operated in surveillance and of aerial reconnaissance. The "Task Group Black Cats" was reconstituted on the basis of Al Jaber in June 2016, and operated in close synergy with the other coalition structures; the effectiveness of this asset, equipped with the RecceLite reconnaissance pod equipped with electro-optical and infrared sensors, provided a decisive contribution to the operations.

The aircraft, thanks to its effectiveness and reliability, combined with the great autonomy which allows long stays on targets both day and night, developed 6 thousand hours of flight during the entire duration of the operations with the coverage of approximately 17 thousand points of interest by providing valuable intelligence products with its reconnaissance system which have been added to those collected since 2014 by the other components of the Air Force deployed in Kuwait under the Italian National Contingent Command AIR (IT NCC Air) Task Force Kuwait. The use in Afghanistan deserves special mention, where on 7 November 2009, four AMXs deployed in Herat replaced the same number of Tornados based in Mazar and Sharif as part of the ISAF (International Security Assistance Force) mission. The initial task was tactical reconnaissance and support for ground troops limited to the sole use of the 20 mm cannon, a rule of engagement which was then gradually modified.

The use of the cannon was a possibility to be seen in the context of self-defense, therefore immediate air support if troops on the ground had had problems and had been subjected to enemy fire, the so-called TIC (Troops In Contact). Shortly afterwards, on government mandate, the green light was given to the use of the bomb attack capability, even if this remained limited by all NATO assets. The result was that the missions in which armament was dropped within the ISAF operation were numerically very few; most of the missions were in direct support of the ground troops with the possibility of dropping armament if the need was identified. In reality, we generally limited ourselves to making ourselves "heard" for the purpose of deterrence, and to give immediate feedback on the ground of what was happening. In technical terms, this behavior is called "Escalation": not going directly from nothing to the release of armament, but following some steps to verify whether the counterparty, simply in the presence of the planes, desists from the disturbance action. One thing that is always noticed in this type of asymmetric theater is that the use of the fighter aircraft has an excellent deterrent effect; in the vast majority of cases the mere presence or even the mere threat of air intervention is enough to dissuade a poorly organized ground force which knows well that from the moment fire is opened on a patrol or on a ground unit, in a few minutes an airplane arrives on the scene which then never "gives up" them, in the sense that it can follow the

attackers, can see where they are going, can continue to monitor them while also coordinating the intervention of troops on the ground. The result is that attackers try to end an action as quickly as possible or even give up on starting it and this already represents the achievement of an important objective.

In this Operational Theater the AMX proved to be excellent from all points of view, despite the context in which it operated (silica sand, extreme weather conditions) it achieved great successes with cost/effectiveness at the highest levels. It was only during 2012 that the Air Force AMXs deployed in Afghanistan received authorization to attack military targets, specializing in the destruction of communications antennas installed by the Taliban, with the use of intelligent laser-guided bombs of the GBU16 and LIZARD. [20]

There are three areas that made the AMX a perfectly suitable airplane for this type of mission, the first is precisely the ease with which the AMX could be supported even outside the area, therefore a low cost due to the modest logistical support needed by the 'airplane both in terms of material and men.

The second area is the robustness of the aircraft; in Herat the temperatures fluctuated throughout the year from +50 to -20° and the AMX never stopped maintaining a very high efficiency, close to 100%; no sorties were missed for reasons related to the efficiency of the airplane, sorties were canceled

because the weather conditions did not allow flying or did not allow the possibility of carrying out the mission, or because it was no longer necessary to carry out the mission, but not due to machine efficiency problems.

The third area is what the AMX was able to do, in this Afghan scenario where you need to have as much persistence as possible, as much maneuverability as possible, agility, transmit information to the ground in real time, be able to change the mission from reconnaissance to bombing and vice versa easily, even when the airplane is already in the air, therefore being "retasked" as they say in the technical term. The AMX did this whole series of things in what I would call a "normal" way to trivialize, day after day, confirming the aircraft's compliance with this type of scenario. It should be underlined the ability of the AMX to respond to different tasks in such an efficient and effective manner with leaps in quality that are far superior to the investment made on the machine, with a notable return, well above expectations, which would deserve recognition for those who designed it and for the crews and technical personnel of the Air Force who used it.

The AMX was not created to have targeting and reconnaissance pods and the update work was done in later periods, with the various pieces integrated at different times

and not with an initial design. In this context, the ability of an AMX pilot to manage a complex mission that could include both reconnaissance and armed intervention during the same mission with two in-flight refuelings, six hours of mission, retasking and here I firm although I would say at the top of the line. The last AMXs returned to Italy on 20 June 2014, reaching almost 10,000 flight hours and over 3,000 supported missions and it is the first time that an Air Force line has reached this volume of hours and missions carrying out its task with precision and respect for the rules of engagement, reaching over 7,500 objectives assigned in attack and reconnaissance missions without any collateral damage".

The AMX aircraft has proven to be an important asset for the Armed Forces and has taken part in the main training campaigns. Among these, the "Red Flag" in 2003 and the "Green Flag" and the "Red Flag" in Nellis in 2009, the latter flown with the ACOL version and "Night and Day" missions.

After 35 years this plane leaves us, we will no longer see our "TOPONE" sailing the skies and we are sure that we will miss it. Bye Bye "Topone".



Above: Detail of the tail of the AMX Special Color with a driver wrapped in the Italian tricolor greets the AMX line
Below: taxiing of the stunning special color AMX created for the Phase Out event, with Col. Emanuele Chiadroni, the commander of the 51st Wing, at the controls of the aircraft



A PSYCHOLOGICAL PERSPECTIVE ON THE STUDENT-INSTRUCTOR RELATIONSHIP IN THE AERONAUTICAL ENVIRONMENT



Twenty-two years ago, when I "landed" at Base 90 Otopeni as a psychologist, I was asked to present to my fellow aviators, as part of the specialized training, the student-instructor relationship—a topic as controversial and sensitive as the weather, and challenging for me as I was at the beginning of my journey in aviation. Drawing on my professional and life experience since then, I have considered, on an empirical level, what this student-instructor relationship might entail. My initial thought—an important aspect of the psychological approach to understanding any life situation—was that this relationship is akin to the teacher-student relationship from a didactic perspective and the father-son relationship from an affective and moral (attitudinal-value) standpoint. Even today, I believe this first thought still holds true. The entire process of instruction and training in flight activities involves both an informational exchange regarding the acquisition of flying skills and abilities and an affective-attitudinal approach, both of which are essential for the continuous training of aviators, regardless of their role: pilot, co-pilot, navigator, flight

engineer/loadmaster, radio operator, or flight attendant. According to the Flight Crew Training Manual (F.A./Av.-7), flight crew training encompasses all activities conducted by flight crew members, both on the ground and in flight, to achieve the required level of training for each crew member and to obtain/maintain the necessary qualifications. The flight instructor's duties include evaluating the accuracy, skills, capabilities, and limitations of the flight personnel in training, monitoring the correct formation of skills during flights, and correcting mistakes. During debriefings, the instructor should emphasize both the properly formed skills and the unsuccessful or misappropriated maneuvers. Additionally, a flight instructor must be a good pedagogue, possessing the necessary knowledge and skills to perform tasks on board the aircraft and to impart this knowledge to the trainees (understanding the aircraft systems and equipment, normal and emergency operations, prohibited maneuvers, and performance in various flight conditions). From a psychological perspective, a flight instructor

needs to exhibit good emotional balance, communication skills, understanding, involvement, patience, tact, responsibility, and a desire to teach and train others. The instructor should serve as a role model, both professionally and morally (attitudinal-value), commanding respect from students through their attitude and personality. To qualify as an instructor, regardless of the category of flight personnel, during the medical evaluation at INMAS, the air base psychologist prepares a psychological profile. This profile presents the psycho-aptitude potential, data about the flight activity, family background, career, and motivation to become an instructor. As for the student, they undergo a specific training program for each individual qualification. The training process involves evaluating the level of training and certifying the qualification in official documents. From a psychological standpoint, the student needs to demonstrate motivation, openness, conscientiousness, and perseverance to acquire the necessary knowledge. In recent years, there has been an increasing emphasis on

promoting young flight personnel who are more engaged in flight activities. It is recommended that the instructor and the student maintain a professional relationship based on mutual respect to ensure the optimal transmission of information and the development of professional skills. Both the instructor and the student must demonstrate an attitude of fair play, accepting and respecting the rules loyally, and taking responsibility for their actions and/or errors, regardless of their role within the flight crew.

Over time, I have had the opportunity and joy of meeting quality flight instructors and young flight personnel, both on air transport aircraft and beyond. From our interactions, I have gathered valuable information necessary for understanding and deepening my knowledge of flight activities, making it the subject of long-term studies and research.

The student-instructor relationship is a complex issue with a particularly important impact on the entire flight crew, carrying major implications for aviation safety. Understanding the psychological aspects of flight activities has significantly evolved in recent years, becoming a continuously developing field. This includes areas such as the human factor, Crew Resource Management (CRM), and Team Resource Management (TRM).

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Ph.D. Florentina Ecaterina Radu



TPS-79 Gap Filler Radar



F-16 FIGHTING FALCON



PATRIOT



ROMANIAN AIR FORCE DISPLAY STAND



C-27J SPARTAN



IAR-330 PUMA

