Bosnia, 1995—Operation Deliberate Force

The Value of Highly Capable Proxy Forces



OPERATION DELIBERATE FORCE, the August–September 1995 North Atlantic Treaty Organization (NATO) air campaign against the Bosnian Serbs, was the first post–Cold War military campaign intended to achieve a political outcome by applying international airpower with only indigenous ground forces contesting territory. The case that Deliberate Force succeeded seems clear: after three years of relative inaction, NATO weighed in with an aggressive air campaign, and less than three weeks later the Bosnian Serbs not only acceded to demands to lift the artillery siege of Sarajevo but also proved willing to make key concessions at the negotiating table. Two months after the air campaign ended, U.S.-brokered peace talks began in Dayton, Ohio; another month later, a peace treaty had been signed and a NATO-led peacekeeping mission was about to commence.

While the facts presented are all accurate, the narrative is an incomplete one. Although the coincident timing might easily suggest that the coercive power of NATO bombing is what brought the Serbs to the table, the more nuanced reality is that the NATO air campaign was only one of multiple concurrent factors at the time and, in truth, probably was not the most important pressure that forced the Bosnian Serbs' change of position. The larger and more complex story is an interweaving of airpower, battlefield developments on the ground, and diplomatic efforts that combined to bring about the outcomes of late 1995. Significantly, the Bosnia example shows the potential importance of effective local ground forces in conjunction with external airpower.

BACKGROUND TO THE CONFLICT: INTERNATIONAL MILITARY INVOLVEMENT IN THE BOSNIAN CIVIL WAR. 1992-95

By the fall of 1995, Bosnia had become a complex, multidimensional conflict involving three major ethnoreligious factions within Bosnia—a tenuous alliance of the Bosnian Muslims and Bosnian Croats on one side battling against the Bosnian Serbs—with two offstage actors: the Croatian Army, participating directly on behalf of the Bosnian Croats, and the Serbian-led federal Yugoslav government, providing a degree of indirect support to the Bosnian Serbs. But the sequence of events and decisions that culminated in the NATO bombing campaign of late 1995 had begun three years earlier with a seemingly cost-free use of airpower to demonstrate international resolve: a no-fly zone.

The Bosnia No-Fly Zone

The first tentative step toward international military involvement in the Bosnian conflict occurred on October 16, 1992, when UN Security Council Resolution (UNSCR) 781 banned all military flights over Bosnia; this affected only the Serbs, as the other factions in Bosnia had virtually no air capability. (In a compromise arrangement that would prove problematic later on, a NATO/UN "dual key" arrangement required both NATO and UN authorization before any punitive military action could be undertaken.) In practice, a variety of political and practical challenges combined to limit the effectiveness of the NATO "no-fly zone" (NFZ) enforcement mission. Although the UN resolution authorized NATO planes to shoot down any offending aircraft, UN and NATO senior leaders, fearing an accidental shootdown of a relief or medical evacuation helicopter, prohibited NATO pilots from engaging any aircraft unless the NATO pilot positively observed the offending aircraft actually conducting combat operations. Bosnian Serb pilots quickly learned to take advantage of the NATO rules of engagement, flying low and slow to evade radar. These tactics, when combined with the practical difficulties of detecting mostly short-duration helicopter flights, at low altitudes and often in poor-visibility flying conditions, made enforcement almost impossible. Hence it was almost a year and a half between the start of the NATO NFZ monitoring mission and the first combat engagement on February 28, 1994, when U.S. F-16 fighter jets shot down four Croatian Serb jets attacking a Muslim-held arms factory in Bosnia. The NFZ enforcement mission continued for another year and a half, but the February 1994 dogfight was to prove the one and only air-to-air engagement of the entire operation.1

In the end, the Deny Flight NFZ aerial enforcement operation was of debatable value. The mission's duration and costs were not inconsiderable: during 970 days—nearly three years—of enforcement operations between April 1993 and December 1995, NATO conducted more than 109,000 aircraft sorties of all types and expended some 23,280 hours of NFZ enforcement time.² The actual impact on the course of the conflict was fairly marginal: Bosnian Serb air forces had negligible impact on the ground battle, and while the NFZ also helped enforce the arms embargo, none of the Bosnian factions had been receiving substantial military supplies by air. The Deny Flight mission was intended to demonstrate UN and NATO involvement and purpose in the Bosnian conflict, but the Bosnian Serbs' willingness and ability to consistently flout the NFZ (there were well over five thousand recorded NFZ violations) instead undermined perceptions of NATO resolve. In sum, the NFZ cost little politically and achieved little militarily; in retrospect, its greatest significance was as the first step on an ascending staircase of NATO involvement in Bosnia.

NATO's use of airpower in Bosnia gradually expanded in scope during the years after Operation Deny Flight began with a mandate initially limited to air-to-air engagements, but over time that increasingly included air actions against ground targets as well. NATO jets mounted a small retaliatory air strike against Serb-held Udbina airfield nearby in Croatia in November 1994, intentionally damaging the runway but not the adjacent planes or buildings.³ On various occasions NATO planes struck Bosnian Serb heavy weapons positions to support threatened UN personnel, protect UN-designated safe areas, or attempt to deter Bosnian Serb advances on the ground.⁴ But these were all short, limited engagements that became derided as "pinprick strikes." The 1995 Deliberate Force air campaign was the final step along a three-year path of increasing international military involvement in the Bosnian conflict, but its duration and magnitude represented a dramatic escalation of NATO's willingness to directly engage the Bosnian Serb faction in Bosnia's three-sided civil war.

The UN, NATO, and the Bosnian "Safe Areas"

What we're grappling with is that we can't defend the "safe areas" per se from the air.

—NATO Southern Headquarters officer, August 30, 1995

The United Nations Protection Force (UNPROFOR), the international peacekeeping force on the ground in Bosnia, was first established in the clos-

ing days of 1991, several months before the Bosnian civil war began. At that time, UNPROFOR was envisioned as an impartial international force whose primary mission would be to separate the warring Croat and separatist Krajina Serb factions in Croatia. As the UN hurriedly sought a headquarters for the new UN peacekeeping force, it settled upon what seemed to be the optimal location: a multiethnic city, located in an adjacent Yugoslav republic, with a large international airport and well-developed transportation links in all directions. On March 9, 1992—less than a month before the Bosnian civil war was to begin—the UN opened its new UNPROFOR headquarters in the Bosnian capital city of Sarajevo.⁵

The UN's peacekeeping roles in Bosnia expanded considerably in 1992 and 1993, both in terms of the territory covered and in the mandates the UN was taking on. A series of UN Security Council resolutions expanded UNPROFOR's role—and, by association, NATO's—far beyond the original core mission of assisting humanitarian deliveries. A major milestone with particularly far-reaching consequences was reached on June 4, 1993, when the UN Security Council passed UNSCR 836 declaring six Bosnian cities and towns—Sarajevo, Tuzla, Bihać, Goražde, Srebrenica, and Žepa—to be "safe areas." The resolution directed NATO to provide close air support "in and around the safe areas to support UNPROFOR in the performance of its mandate." Problematically, although UNPROFOR inherited responsibility for the UN-designated safe areas, it did not receive any additional forces or a clear mandate spelling out how the safe areas were to be protected.⁷ As with the NFZ enforcement mission, international threats to use force to implement UN provisions would prove easy to make but hard to back up when challenged.

A protracted cycle of confrontations between the Bosnian Serbs and NATO continued for two years, with increasing willingness to escalate on both sides. NATO's first close air support mission in Bosnia—and the first air-to-ground bombing in the alliance's history—took place in April 1994 when two-plane strikes hit Bosnian Serb Army targets as the Serbs were on the verge of overrunning the UN-designated Goražde safe area. Bosnian Serb Army commander General Ratko Mladić responded by "detaining" about 150 UN personnel. A protracted series of threats, negotiations, and finally agreements ensued. In May 1995 UNPROFOR commander British lieutenant general Rupert Smith issued an ultimatum insisting the Bosnian Serbs comply with a UN ban disallowing heavy weapons within twenty kilometers of Sarajevo—the issue that would later precipitate the Deliberate

Force air campaign. NATO aircraft bombed two ammunition bunkers near the Bosnian Serb capital of Pale, southeast of Sarajevo, after the Serbs made no effort to respond, but by this point in the conflict the Bosnian Serbs were not intimidated by NATO's "pinprick strikes." Rather, they responded by taking more than four hundred UNPROFOR peacekeepers and UN military observers hostage, using some as human shields to deter NATO air strikes against likely targets. NATO eventually backed down from the heavy weapons ultimatum, and the UNPROFOR hostages were released. The mid-1995 hostage-taking episode was to prove not only a humiliating debacle for the UN but also a stark and visible example of how little deterrent value UN peacekeepers and the threat of NATO air strikes had by that point. But much worse was yet to follow.¹⁰

On July 12, 1995, Bosnian Serb Army troops directly led by General Mladić attacked the surrounded government-held enclave of Srebrenica in eastern Bosnia in force, paying no heed to its UN safe area designation. A hopelessly outnumbered, understrength, and ill-equipped Dutch UNPROFOR battalion was powerless to halt the attack, and air strikes by two Dutch F-16s destroyed a single tank but had no effect on the advancing Serb armored column. As Swedish diplomat Carl Bildt later put it, "Close air support in isolation was an instrument of limited tactical value. Although useful as a deterrent, its actual use tended to demonstrate its impotence more than anything else. When the F-16s had returned to their base in Italy, most of them having failed even to see a target, Mladić's soldiers just marched into Srebrenica." The subsequent massacre of more than 7,700 captured Bosnian men and boys in the aftermath of the enclave's capture highlighted in the starkest possible way NATO's inability to defend the safe areas with airpower alone.

The Srebrenica massacre and the unchallenged Bosnian Serb takeover of the adjacent Žepa safe haven a few days later were to prove the catalysts for a profound change in the willingness of NATO (and a somewhat more reluctant United Nations) to forcibly employ airpower in Bosnia. NATO foreign ministers met in London on July 20 and 21 and issued a declaration that if the Bosnian Serbs attacked Goražde (the only remaining, and seriously threatened, eastern Bosnian UN safe haven), NATO would retaliate with a "disproportionate" response, which could employ "decisive and substantial air power" anywhere in the "wider area" of Bosnian Serb military operations. Shortly thereafter, NATO extended the same ultimatum if the Bosnian Serbs attacked any of the other three remaining safe areas: Bihać, Tuzla, and Sarajevo. For the first time since 1992, the conditions were thus set for a true

military showdown between NATO and the Bosnian Serbs. It remained to be seen, however, whether there would be a triggering event.¹⁴

That event came only weeks later, when on August 28, 1995, a mortar bomb arced through the Sarajevo sky and struck the crowded Markale marketplace, a popular outdoor shopping area for the sparse goods available in the besieged city. Within minutes, thirty-seven Sarajevo civilians were dead and nearly one hundred more were wounded. Bosnian Serb shelling of Sarajevo was nothing new; approximately one million artillery shells had already fallen on the city since April 1992, killing more than 10,000 Sarajevans. 15 Nor was this the first mass-casualty event in the city; indeed, the very same Markale marketplace had been the scene of a February 1994 attack that had triggered NATO's first explicit threat of aerial intervention and the imposition of the heavy weapons ban around Sarajevo. 16 But coming after the glaring Bosnian Serb defiance displayed during the NATO hostage-taking episode earlier that summer, and just weeks after the mass atrocities of Srebrenica that had so horrified the world, the Markale market massacre became the galvanizing event that spurred the UN and NATO to undertake much more aggressive actions. Citing the earlier declarations that disproportionate force would be used if necessary to defend any attacked safe havens, allied planners and military forces prepared for combat.

THE ADVERSARY: THE BOSNIAN SERBS

When Yugoslavia began to tear apart in mid-1991, the Yugoslav National Army (Jugoslovenska Narodna Armija, JNA), although probably the most integrated national institution in the country, inevitably also began to rip asunder as the country the army represented literally began to come apart beneath it. As one Yugoslav republic and then another declared independence, JNA officers, garrisons, and equipment literally overnight ended up in newly self-proclaimed sovereign countries. At the same time, a host of organized and semiorganized locally and politically based militias rose up in this chaotic, uncertain, and dangerous time. Hence was born the Bosnian Serb Army (Vojska Republike Srpske, VRS), the military forces of the self-proclaimed Bosnian Serb Republic (also known as the Republika Srpska, RS). In the confusing, fragmented surreality that the Bosnian conflict had become, the RS was fighting to secede from the newly recognized independent country of Bosnia and Herzegovina, which had itself just declared its independence from the former nation of Yugoslavia.¹⁷

The Bosnian Serb Army was organized into six corps and could theoretically field as many as 150,000 troops, although in reality by 1995 it was battling desertions and reaching deep into the manpower pool to maintain its forces in the field. The VRS had inherited most of the Yugoslav National Army's disproportionately ethnic Serb officer corps in Bosnia and—of crucial importance—the vast majority of former JNA equipment in Bosnia. In total, the Bosnian Serb Army inventory included roughly 500 tanks, 250 armored vehicles, about 500 artillery pieces, and 400 to 500 heavy mortars. In the area immediately surrounding Sarajevo, where the main focus of the Deliberate Force air campaign would be directed, NATO planners estimated the Bosnian Serb Army mustered some 15,000–20,000 troops with approximately 300 heavy weapons. In 200 heavy weapons.

The Bosnian Serbs had a relatively small Air and Air Defense Force (Vazduhoplovstvo i Protivvazdušna Odbrana, V i PVO), with about 2,000 personnel in total. The fixed-wing air force included about twenty Yugoslav-produced J-21 Galeb-Jastreb and J-22 Orao light fighter-bombers, but these played no role during the Deliberate Force air campaign (and almost no role in the Bosnian War in general) due to the no-fly zone and the clear superiority of NATO's air-to-air capability. More important for the Bosnian Serb military operations on the ground was the small fleet of military helicopters, including about fifteen Mi-8 Hip transports and another fifteen Gazelle light attack/ observation helicopters.²¹

The Bosnian Serb Air Defense (Protivvazdušna Odbrana, PVO) element had a quite credible ground-based air defense apparatus for Republika Srpska's small territory—roughly the size of Maryland. This integrated air defense system (IADS) included early warning and air defense radar systems; command, control, and communications (C3) nodes; SA-2, SA-6, and SA-9 surface-to-air missile (SAM) systems; more than a thousand antiaircraft artillery (AAA) guns of all types; and unknown but substantial numbers of mostly SA-7 man-portable air defense systems (MANPADS).²²

The Bosnian Serb Army's advantages relative to their adversaries were better military leadership and organization, as well as vastly greater firepower and mobility resulting from far superior equipment holdings. The Bosnian Serb Army's critical disadvantage was in manpower; fielding even the number of troops the VRS was able to mobilize was an enormous strain on the self-proclaimed Bosnian Serb Republic. Worse still, the Bosnian Serbs were seriously outnumbered by their Muslim-Croat adversaries even before the Croatian Army intervened in the conflict in mid-1995. The addition of tens

of thousands of well-trained, well-equipped Croatian Army professionals to Bosnia's battlefields would prove too much for a Bosnian Serb Army that was just barely holding on to its gains.

In sum, by the second half of 1995 the Bosnian Serbs were in an increasingly fragile position across the board: militarily, politically, and economically. The Croatian Army's recent and devastating Operation Storm blitzkrieg offensive had irrevocably changed regional realities, crushing the short-lived Croatian Serb (also known as the Krajina Serb) ministate and thereby removing the Serb-held enclaves in Croatia that had partially secured the Bosnian Serbs' flanks.²³ After the Bosnian Serb massacre at Srebrenica, both Bosnian Serb civilian leader Radovan Karadžić and Mladić were indicted by the International Criminal Tribunal for the Former Yugoslavia (ICTY) as war criminals, making the already unrecognized Republika Srpska essentially a pariah state. And, economically, the Bosnian Serb substate was attempting to maintain a full wartime mobilization while under international sanctions and with minimal support from Belgrade. As a battlefield force, the Bosnian Serb Army could still achieve tactical victories against eastern Bosnia's isolated and ill-defended enclaves, but overall it was overstretched, undermanned, and gradually losing its comparative advantages in organization, military professionalism, firepower, and mobility. As the Bosnian Serb military was slowly growing weaker, its opponents were progressively growing stronger.²⁴

THE OPPOSITION ON THE GROUND: THE BOSNIAN MUSLIMS, BOSNIAN CROATS, AND CROATIAN ARMY

Opposing the Bosnian Serbs were the de facto beneficiaries of the NATO air campaign, the Bosnian Muslims, who were in a somewhat tenuous alliance (the "Bosnian Federation") with the Bosnian Croats. ²⁵ The Bosnian Federation during this phase of the conflict also was being directly supported by Croatian Army regular military units that had overtly crossed the border in force to fight alongside their ethnic co-nationals in Bosnia.

The Bosnian Army in 1995

When the former Yugoslav republic of Bosnia and Herzegovina declared its independence in April 1992, the Sarajevo government instantly found it had a war on its hands but not an army to fight it. The Bosnian Army (Armija Republike Bosne i Herzegovine, ARBiH)—almost exclusively Muslim but

officially the national armed forces of all Bosnia—thus began the conflict as by far the least-prepared and least well-equipped factional fighting force: the Bosnian Serbs had inherited the considerable ex-JNA garrisons and equipment, while the Bosnian Croat militias at least benefited from a degree of organization from the political parties that had sponsored them and from equipment received from fellow Croats in Croatia. The Bosnian Army, by contrast, began the civil war with neither an organization nor equipment and would suffer terribly for these deficiencies in the following years.²⁶

Having come far since its traumatic inception, by mid-1995 the Bosnian Army fielded a very sizable force of some 230,000 fighting men; for comparison, this was more than double the size of the contemporary British Army. The ARBiH had just reorganized during the winter of 1994–95 into six regionally based corps and one independent division. It is important to note that under the direction of Bosnian Army commander General Rasim Delić, the ARBiH also had gradually improved its corps-level leadership, staff planning, and logistics, though it still was nowhere near as professional or capable as its Bosnian Serb rivals. At the small-unit and soldier level, infantry organization and tactics (the ARBiH was overwhelmingly an infantry force) also had improved during the previous winter's reorganization and training, to the point where the ARBiH infantry was in some ways even better than its VRS opponent.²⁷

Because all sides in the conflict believed they would retain only whatever territory they physically occupied at the end of the war, the Bosnian Army was obligated to fight a positional conflict and therefore built the best fighting force it could with the resources at hand. In this brutal contest for territory, the ARBiH's critical deficiency remained a debilitating lack of armor, artillery, and firepower in general; a serious secondary weakness was its lack of mobility. In combination these shortfalls severely limited the Bosnian Army's ability to break through enemy lines due to lack of armored spearheads or artillery firepower. And even when tactical breakthroughs were achieved, Bosnian Army forces could not advance farther than their indirect fire could cover or faster than their organic mobility would allow. In practice, this limited advances to no more than a few miles moving no faster than infantry could walk, due to the limited range of supporting mortars and lack of motor transport. Deep breakthrough was all but impossible, as the ARBiH almost completely lacked armored forces, mechanized infantry, or motorized transport that would allow for advances into enemy rear areas.²⁸

To compensate for its material and logistical shortfalls, the Bosnian Army

came to adopt a "bite and hold" campaign doctrine. In the past, Bosnian Army forces had suffered from overreach, attempting large offensives that at times achieved initial territorial gains which the overextended ARBiH was usually unable to retain. By 1995 the Bosnians were making a series of limited advances, which the ARBiH infantry formations were able to successfully defend. The Bosnian Army also had improved tactically, moving away from the poorly coordinated mass infantry attacks it had used in earlier years and instead employing a much more sophisticated force structure and offensive doctrine that relied on specialized assault units to disrupt Bosnian Serb defenses in depth followed by regular army units that would advance and exploit the disorganized Bosnian Serb positions.²⁹

In sum, by late 1995 the Bosnian Army—the largest proxy force that the NATO air campaign would be indirectly assisting militarily, though not overtly supporting politically—was a military that had genuinely improved through the harsh school of battlefield lessons learned. It still had serious material deficiencies and was more self-taught than professionally trained at all levels. But the ARBiH had demonstrated the ability to make incremental gains against their Bosnian Serb foes and shown the capacity and sheer will to make additional advances with or without international support.

The Bosnian Croats in 1995

Although the Bosnian Army, through great expenditures and effort, had managed to evolve and improve between 1992 and 1995, its nominal Bosnian Croat allies in the Croatian Defense Council (Hrvatsko Vijeće Obrane, HVO) had not. With the exception of the four elite HVO Guards brigades, corps-level artillery, and certain specialized units, such as the military police battalions, the HVO remained a distinctly second-tier force. The HVO had a nominal strength of 40,000 to 50,000 troops organized into four "Corps Districts," although by mid-1995 many conscripts and reservists had been demobilized, likely leaving the HVO with no more than half its theoretical strength actually in the field. The HVO was not quite as deficient as the Bosnian Army in heavy equipment, but its holdings were nevertheless sparse: about fifty tanks and three dozen armored personnel carriers (APCs) and infantry fighting vehicles (IFVs), with roughly fifty artillery pieces. Moreover, the great majority of these heavy weapons were assigned to the HVO Guards brigades and corps artillery regiments, leaving the other HVO units almost entirely lacking in heavy weapons of any type.³⁰

The HVO's heavy weapons deficiencies meant it was almost wholly dependent on its larger and much more capable relative, the Croatian Army, for artillery and armor support. The HVO's assignment of all its best personnel to the professional, elite units created a small cadre of formations capable of local offensive operations but left the remainder of the force's units (not inaccurately called "home defense regiments") almost completely devoid of talent, equipment, and offensive capability. In practice, this meant that during the combined offensive operations of late 1995, the HVO would function as little more than a supporting auxiliary of the Croatian military forces then operating inside Bosnia.

The Croatian Army

The Croatian Army (Hrvatska Vojska, HV) by mid-1995 had developed into a well-organized, well-led fighting machine with battle experience and great confidence following its crushing victory against the Croatian Serbs in Operation Oluja (Storm) just weeks earlier. When the Yugoslavian civil war began in 1991, the Croatian Army had grown very rapidly from a small, cadre force of former police into a hastily assembled army with some 200,000–250,000 men under arms. However, this number was not sustainable, and when major combat between the HV and rebel Croatian Serbs wound down in 1992, the HV took advantage of the respite to reorganize, retrain, and prepare for the renewed fighting it knew would come again eventually.³¹

After the bitter fighting and initial reverses of 1991–92, the Croatian Army had spent 1993–94 building its forces, developing a war-winning combat doctrine, and gaining vital combat experience in a series of smaller operations. By 1995 the reorganized HV had about 100,000 active troops, about one-third of whom were experienced professionals and two-thirds conscripts serving tenmonth terms. Former conscripts also remained in the HV's extensive reserve force, providing a theoretical pool of about 180,000 reservists who could be called up if needed. The new HV was built around a solid core of elite combat forces: the eight HV Guards brigades and a cadre of other military police, artillery, and combat engineer formations. By mid-1995 Croatian Army troops had been operating in Bosnia for well over a year, lending support to otherwise weak HVO elements in the southern and western parts of the country adjoining Croatia. Almost all the Croatian Army forces who operated in Bosnia were professionals, as the fight was outside Croatia's borders.

The Croatian military had also built up a remarkable inventory of military

equipment in only four years, especially considering that all the states of the former Yugoslavia were under a UN-imposed arms embargo for this entire time. By mid-1995 the country had about 250 main battle tanks, at least 300 armored personnel carriers, and more than 1,000 artillery pieces.³⁵ Most of the heavy equipment had been captured from ex-JNA garrisons in Croatia in 1991. This had been augmented by an extensive and effective covert weapons acquisition effort that had cut shadowy deals to buy up not just small arms but also some heavy weapons from the arms depots of the former Soviet Union and Eastern Europe. Croatia also managed to restart production at several former Yugoslav defense industry plants on its soil. All this effort did not come cheap; in 1995 Croatia spent nearly \$2 billion—12.5 percent of its GDP—on defense spending.³⁶ But from Zagreb's standpoint, it was money well spent.

At the same time it was reorganizing, the Croatian Army developed a blitzkrieg-like doctrine designed for the new force, centered on the principle of rapid penetration of enemy defenses by the HV's elite units, bypassing major areas of resistance and instead driving on to reach key campaign objectives deep in enemy rear areas. Therefore Ministry police, special police, and military police forces played particularly important roles in the Croatian military organization, in the context of the nation's history; when the civil war first broke out and the majority of the JNA garrisons sided with Belgrade, the Croatian police forces were among the most important quasi-military formations the breakaway republic could initially rely on in the fight. These paramilitary police forces frequently performed mopping up and rear-area security functions during Croatian military campaigns, freeing up regular army troops for offensive operations.

Training was the crux of the Croatian Army's transformation between 1992 and 1995. Depending on one's perspective, this restructuring was either harmed or helped by the HV's initial shortage of professional military officers and experienced noncommissioned officers, since these ranks had been dominated by ethnic Serbs in the pre-breakup JNA. The Serbs' departure robbed the HV of experienced leaders but also wiped much of the ex-communist legacy and doctrine from the infant force. Conversely, the HV benefited from the experience and mind-set of Croatian émigrés who joined the HV from other Western militaries. General Ante Gotovina is one particularly interesting example; having previously served as an enlisted soldier in the French Foreign Legion, he joined the Croatian National Guard during the 1991 initial battle for independence and rose through the ranks to HV major general by 1994. In

1995 Gotovina would serve as commander of all combined Croatian and Bosnian Croat forces during the final offensives of the Bosnian War.⁴⁰

THE INTERNATIONAL INTERVENERS: NATO AND THE RAPID REACTION FORCE

Although the intervention in Bosnia was overwhelmingly an air operation, it did involve both NATO air forces operating from outside the country and the UN's small, newly formed Rapid Reaction Force firing from positions on the ground. These two contingents had very different capabilities and somewhat different mandates, as would be seen.

The NATO Air Armada

The NATO air armada available for Deliberate Force was modest by the standards of modern warfare, including about 350 allied aircraft of all types, including land- and sea-based air assets. About two-thirds of these were combat aircraft of some type, with the other third consisting of supporters, including tankers, reconnaissance, airborne early warning, electronic warfare, and combat search and rescue aircraft. The majority of the flights were to take off from NATO air bases in Italy, but combat and support sorties also flew from Germany, France, the United Kingdom, and the U.S. Navy aircraft carrier USS *Theodore Roosevelt*. Eight NATO members contributed aircraft to Deliberate Force combat operations: France, Germany, Italy, the Netherlands, Spain, Turkey, the United Kingdom, and the United States.⁴¹

The U.S. contribution to Deliberate Force—which included U.S. Air Force, Navy, and Marine aircraft—was essential in terms of not just numbers (roughly three-quarters of the NATO aircraft committed) but capabilities as well. U.S. aircraft flew about two-thirds of the Deliberate Force sorties and provided indispensable contributions in certain key areas. These planes flew about 90 percent of the suppression of enemy air defense (SEAD) missions, with Spain and Germany flying the rest. The U.S. aircraft also dropped about 88 percent of the precision-guided munitions (PGMs), whereas the other NATO allies dropped about 85 percent of the unguided weapons. 42 In fact, Deliberate Force was the first military campaign in which PGMs outweighed conventional ordnance dropped—a trend that would continue in future operations as both the availability of PGMs and the political costs of errant bombs increased. 43

UNPROFOR and the Rapid Reaction Force

After the humiliations of the Bosnian Serb hostage-taking incidents in May–June 1995, UNPROFOR adopted and began to implement a new doctrine of peacekeeping force consolidation combined with a greater capacity for retaliation. Beginning in late June, the UN had been discreetly redeploying its UN-PROFOR peacekeepers from isolated positions to a smaller number of more defensible ones. As a result of these relocations, by the start of the NATO air campaign UNPROFOR had only a handful of peacekeepers remaining in truly vulnerable positions.

The drawdown of UNPROFOR troops and military observers from vulnerable outlying positions in Bosnia was a critical enabler for the NATO air campaign, substantially increasing NATO's freedom of action and giving the international community much greater latitude to initiate forceful intervention without fear of the hostage-taking debacles that had hamstrung NATO's attempts to use coercive air strikes in 1994 and earlier in 1995. Given the number, disposition, capabilities, and mandate of the UN peacekeepers, UN-PROFOR's forces were not combat assets in any true military sense. Rather, as previous events had shown, as potential hostages they were strategic liabilities.

At the same time the UN was scaling back its traditional peacekeeping mission to reduce its vulnerability, UNPROFOR was building a wholly new and more muscular component. This was to be the "Rapid Reaction Force" (RRF), which had been authorized by UN Security Council Resolution 998 on June 16, 1995. Unlike the rest of UNPROFOR, the RRF was intended to be a ground-based, mobile, and heavily armed contingent that could rapidly and forcefully respond to any threats to the peacekeeping contingents. RRF vehicles and weapons—which, symbolically, were painted in camouflage green, not UN white-were meant to have both the military capability and the mandate to force their way through obstructed checkpoints or pound Bosnian Serb heavy weapons in prohibited areas with artillery fire. Owing to various delays, the RRF was neither positioned nor prepared to respond to the Srebrenica disaster in mid-July. However, its first, highly publicized, operational deployment was made a week later on July 24, when a trinational artillery formation was positioned atop Mount Igman, south of Sarajevo. When fully established, the RRF artillery formation included a battery of eight French 155mm howitzers, a battery of twelve British 105mm field guns, a composite battery of twelve French and Dutch 120mm heavy mortars, a

squadron of French armored reconnaissance vehicles, and two infantry companies (one British, one French).⁴⁴

The RRF eventually reached a nominal strength of about 10,000 troops, somewhat smaller than the maximum of 12,500 authorized by UNSCR 998. Besides the Anglo-Dutch-French Multinational Brigade (which included the composite artillery formation), with about 3,200 troops, other dedicated formations included the British Twenty-Fourth Airmobile Brigade (about 5,000 troops), a Franco-German logistics group (about 2,400 troops), and a French brigade that remained on standby in France. However, several planned unit deployments were delayed, and the RRF never reached its full authorized strength in Bosnia. When the time came, it would be the RRF artillery formation atop Mount Igman that would play a supporting role during the Deliberate Force air campaign. 46

HOW DID DEVELOPMENTS UNFOLD DURING DELIBERATE FORCE?

Operation Deliberate Force began in the early hours of August 30, 1995, when sixty NATO aircraft took off from bases in Italy and the aircraft carrier USS *Theodore Roosevelt*, striking targets south and east of Sarajevo. These very first shots of the air campaign were part of a subsidiary plan called Operation Deadeye, intended to disable the Bosnian Serb air defense network and allow follow-on strikes to more safely go after the other targets on the list. These strikes were directed at previously identified air defense targets, including radars, command posts, communication relays, and SAM sites. Once the Bosnian Serb air defense network had been badly damaged—though not entirely disabled—additional strike aircraft followed to bomb fixed military targets. By the end of the day on August 30, more than three hundred sorties had struck some twenty-three major targets.⁴⁷

In addition to the NATO air campaign, the RRF atop Mount Igman opened fire with its big guns, directly engaging Bosnian Serb heavy weapons in the Sarajevo exclusion zone. British, French, and Dutch artillery pieces expended more than one thousand rounds in counter-battery fire against VRS heavy weapons. The RRF initially claimed to have destroyed up to thirty of the roughly three hundred Bosnian Serb heavy weapons around the capital, although these optimistic first reports were later downplayed in subsequent statements.⁴⁸ However, the RRF's artillery guns largely stood down thereafter, once the Bosnian Serbs hid any exposed heavy weapons.⁴⁹ It also later emerged that UN headquarters in New York had ordered the RRF to stop car-

rying out counter-battery fire missions except in self-defense, on the grounds that the RRF could not be used in an "offensive" role.⁵⁰

Late on the evening of August 31, French lieutenant general Bernard Janvier, the overall UN commander in the former Yugoslavia, requested a twenty-four-hour suspension of the NATO air strikes. Janvier wanted to meet with Bosnian Serb general Mladić to discuss conditions for ending the NATO bombardment. After high-level consultations, NATO commanders agreed to the suspension beginning in the early morning of September 1. Many, even in the NATO leadership, were therefore surprised to discover that the bombs had stopped falling; NATO air operations had been halted after just fifty-one hours of combat operations. Only 635 sorties of all types had been flown, of which 318 were strike sorties directed against about twenty-five targets.⁵¹

Later on September 1, Janvier had a contentious fourteen-hour meeting with Mladić. At the meeting Mladić pledged he would lift the siege of Sarajevo, but, using a now familiar tactic, he made his promise contingent on a set of conditions and caveats, including guarantees that the Bosnian Muslims would not advance once the VRS heavy weapons were withdrawn and that the UN would assume control of any ARBiH heavy weapons inside Sarajevo. Nevertheless, Janvier tentatively accepted Bosnian Serb assurances that the weapons would be withdrawn and asked NATO to extend the temporary suspension of attacks against the Bosnian Serbs. The cease-fire, intended to allow the Bosnian Serbs another opportunity to withdraw the prohibited heavy weapons away from the Bosnian capital, continued.

The decision to have a bombing pause was a controversial and contentious one, prompting sometimes heated debates between the UN and NATO leadership, between member nations and senior leaders within NATO, and between elements of the U.S. chain of command. While the UN was inclined to give the Bosnian Serbs time to see if they would indeed remove the heavy weapons from the exclusion zone, some NATO leaders, including Secretary General Willy Claes and NATO's overall operational commander, U.S. Navy admiral Leighton Smith, reportedly were furious with the bombing suspension, believing Janvier had been tricked into stopping the air campaign in exchange for more Bosnian Serb assurances, half-truths, deceptions, and outright lies. 54

During the bombing pause there was considerable debate between UN and NATO leaders about whether and when to resume military operations, reflecting the dilemma that policymakers and military commanders faced. On the one hand, suspending an air operation prompted by Bosnian Serb

defiance of previous ultimatums was likely to increase Serb intransigence on the battlefield and at the negotiating table. But as one Western diplomat said at the time, "A campaign that goes on and on, where destruction becomes its own objective, would obviously not be good for us. And the more bombs that are dropped, the greater the chance of a bomb going astray." 55

The bombing pause did give NATO planners a chance to reconsider their campaign strategy, given the realization that the Bosnian Serbs were not about to capitulate as initially expected. From the outset, NATO planners recognized that a direct air campaign to destroy the heavy weapons around Sarajevo was likely to involve much time and effort in return for little success. Finding and positively identifying small, mobile targets in bad weather, vetting and approving dynamic targets for aircraft on the fly, and attempting to destroy every armored vehicle and artillery piece in the 240-square-mile exclusion zone was simply impossible.⁵⁶ NATO banked on the concept that the Serb guns could be leveraged out of the exclusion zone with an indirect campaign of attacks against large stationary support targets such as ammunition depots and communications nodes.⁵⁷

However, this campaign against a relatively restricted set of Bosnian Serb military support and infrastructure targets proved to have little immediate effect on Bosnian Serb behavior or warfighting capacity. By the time of the bombing pause, the air campaign clearly had not crippled the Bosnian Serbs' strategic ability to run the war and had almost no effect on deployed field forces. Bosnian Serb command and control, for instance, proved highly resilient despite NATO destruction of communications infrastructure.⁵⁸ Attacks on munitions depots and military infrastructure might have inflicted longterm damage on the force's ability to sustain combat operations but had little or no effect on the Bosnian Serb Army's near-term ability to fight in the field. One NATO officer expressed skepticism at the time that the war-hardened Serbs would concede to an attack strategy that prioritized ammunition stocks when "they've got more ammo in the ground than dirt." Moreover, most VRS units had long maintained at least three weeks of ammunition and other supplies stocked in numerous small reserves all along the front lines, both to reduce vulnerability to air attack and to minimize logistical and time demands when supplies were needed for local counterattacks. 60

Overall, the first three days of NATO operations, though moderately successful, had not been without aircraft losses, mishaps, and other problems. A U-2 reconnaissance aircraft supporting the operation crashed on take-off from its home base in the United Kingdom on August 29, killing the

pilot. ⁶¹ A French Mirage 2000 fighter-bomber was shot down the next day, most likely by an SA-16 MANPADS, and both downed pilots were immediately captured by the Bosnian Serbs. ⁶² In addition, bad weather and poor visibility—both typical of the region at that time of year—had resulted in numerous canceled or ineffective missions, a chronic problem that was to persist throughout the Deliberate Force campaign. ⁶³ A UN military spokesperson acknowledged on September 3 that neither the air campaign nor the RRF shelling had had much effect on the Bosnian Serb heavy weapons in the prohibited zone around Sarajevo: "The vast majority have very rapidly been moved into concealed cover. . . . We have not destroyed many of the heavy weapons around Sarajevo." ⁶⁴ Initial optimism that the NATO air campaign up through the bombing pause was having a decisive military impact gave way to a more sober realization that this was not going to be as short or easy an operation as many had thought or hoped.

By the fourth day of the bombing pause, it was clear that the Bosnian Serbs remained defiant on the Sarajevo heavy weapons despite any assurances Janvier believed he had received. The Bosnian Serbs had publicly rejected NATO's terms and made only minor adjustments to the heavy weapons positions around Sarajevo, repositioning or concealing weapons within the zone rather than redeploying them out of the prohibited area. No more than two dozen of the roughly three hundred Bosnian Serb heavy weapons had been moved by the NATO deadline, which the UN considered an unacceptable failure to comply.⁶⁵

On the afternoon of September 5, the bombing pause ended after a total of 104 hours, and Operation Deliberate Force strikes resumed. Having nearly exhausted its fixed target list around Sarajevo, NATO broadened its air campaign to strike a wider set of targets located throughout Bosnian Serb—held territory. In general, the geographic strike area was expanded to include western Bosnia, but the classes of targets remained the same: ammunition depots, army garrisons, and other military facilities. 66 Certain bridges were added to the approved target list on September 7, but otherwise the "dual-use" targets with both military and civilian functions remained off-limits. 67

On September 10 the United States escalated the conflict in a different manner (at least in the eyes of some) when the cruiser USS *Normandy* fired thirteen Tomahawk land attack cruise missiles (TLAMs) at Bosnian Serb air defense targets close to Banja Luka, in the heart of western Bosnia. ⁶⁸ Militarily, U.S. planners did not view the employment of TLAMs as a noteworthy escalation, instead considering their use a logical means of disabling Bosnian

Serb air defense sites deep in Bosnian Serb-held territory that would have been risky to strike with manned bombers. But their use was perceived differently by NATO allies, who felt the United States had both escalated the types of force employed and struck geographically at a location close to Republika Srpska's largest city. ⁶⁹ The Bosnian Serbs and Russians also considered the TLAM strike near Banja Luka to be an escalatory move, and both responded with vigorous rhetorical condemnations.

September 8–17: The Scales of Battle Tilt in Western Bosnia

At this point, a week and a half into the NATO air campaign, critical developments began to take place not from the air but on the ground. On the morning of September 8, the combined forces of the Croatian Army and Bosnian Croats initiated an attack in western Bosnia that would change the war. What would prove to be the decisive final campaign of the Bosnian conflict began with an HV/HVO attack, Operation Maestral (Breeze) launched with two Croatian Army Guards brigades spearheading attacks northward in west-central Bosnia. These forces made important gains on September 9 and 10, allowing for a rest and reorganization day on September 11. The Croatian attack resumed on September 12, and by September 13 the combined HV/HVO forces had achieved their goal of capturing the crucial town of Jajce. 70 Farther to the west, a secondary attack to capture the town of Drvar had stalled, but another push reinforced by additional HV troops dislodged the VRS defenders from the town on September 14.71 By this point, Operation Maestral had moved the front lines as far as twenty miles and netted the HV/HVO more than 950 square miles of territory; about 5 percent of Bosnia's land area had changed hands in less than a week.⁷²

Meanwhile, the Bosnian Army was mounting three concurrent corps-sized offensives in distinct areas, evidence of how far the ARBiH had evolved since 1992. In the Ozren Mountains, northwest of Sarajevo, elements of the ARBiH Second and Third Corps launched Operation Uragan (Hurricane), which captured a critical stretch of highway linking the government-held cities of Tuzla and Zenica after a tough, grinding fight. Operation Uragan made significant though not spectacular gains—taking roughly one hundred square miles and the vital highway segment—contributing to the pressure on the Bosnian Serbs with a competently executed, multi-corps offensive in a VRS economy of force sector. West of the Ozren Mountains battle and east of the HV/HVO Operation Maestral, a Bosnian Army Seventh Corps attack

also made modest gains. ARBiH Seventh Corps troops—largely displaced Muslims from western Bosnia fighting to reclaim their homelands-made shallow gains along a broad front on the HV/HVO's right flank and on September 13 captured the long-sought town of Donji Vakuf. Like the ARBiH's Operation Uragan, the Seventh Corps attack made limited but measurable gains—perhaps one hundred or so square miles—while also contributing to the unrelenting offensive pressure on the overtaxed VRS defenders across western Bosnia. The last and most important Bosnian Army offensive was to come from the extreme west, the so-called Bihać pocket, defended by the ARBiH Fifth Corps. Uncharacteristically for a Bosnian Army attack, the advance was spearheaded by armored vehicles recently captured from the VRS and assisted by artillery fire from Croatian Army units. Thus supported, the ARBiH Fifth Corps was able to smash through the weak VRS Second Krajina Corps defensive line and make an unprecedented, lightning advance thirty miles southeast to take Bosanski Petrovac on September 15. The leading edge of the advance then raced forward another twenty-five miles east to take Ključ on September 17. Other Fifth Corps elements took Bosanska Krupa, on the edge of the Bihać pocket, that same day, enabling a broad combined force advance across the great swath of territory between the Bihać breakout point and the point of the spear at Ključ.73

The unprecedented blitzkrieg gains the ARBiH made from September 13 to September 17 were quite as significant as the better-recognized HV/HVO gains from Operation Maestral during the same time frame. This was true in terms of both the amount of territory captured and the degree of pressure placed on the Bosnian Serb military and political leadership during the crucial decision-making period around September 15. Meanwhile, at exactly this same moment—as the Bosnian Serbs were losing nearly a tenth of their republic's territory in a single week—the NATO air campaign was approaching a crisis point of a very different sort.⁷⁴

Mid-September: NATO's Near-Crisis and Ultimate Success

We thought we'd win with a knock-out in the first round, and now we're alarmed at the thought of 15 rounds.

-NATO official, mid-September 1995

While the ARBiH and HV/HVO's dramatic battlefield gains were changing the map of western Bosnia, the impasse between NATO and the Bosnian Serbs over the heavy weapons around Sarajevo continued. A week after the air campaign had resumed, despite high operational tempo strikes through September 13, the Bosnian Serbs still had not acceded to NATO's Sarajevo exclusion zone demands. By September 14, when bad weather (perhaps fortuitously) intervened and curtailed flight operations, there was profound unease at NATO headquarters about the likely duration and outcome of the air operation. The campaign against the fixed target set had not fundamentally degraded the VRS ability to fight, the limited effort to find and destroy Bosnian Serb mobile heavy weapons had had little success, and there was no apparent sign that Bosnian Serb capitulation was near.⁷⁵

The original NATO air campaign plan had been based on a set of increasingly expansive target lists, with escalating levels of political risk and approvals required. Option 1 targets were the Bosnian Serb heavy weapons themselves: tanks, armored vehicles, and artillery pieces in the area around Sarajevo. Option 2 included infrastructure targets directly tied to Bosnian Serb Army military activities: air defense radars and antiaircraft missile sites, command and control facilities, ammunition bunkers, and army barracks and support structures. Option 3 targets were the most controversial, falling into the dual-use or "military-related infrastructure" categories: factories, power stations, bridges, and other predominantly civilian structures that could be used indirectly to support military activities. This last category had much higher levels of political risk and probability of civilian casualties and therefore required further approvals from both NATO and the UN, which had not been granted.⁷⁶

By mid-September, with more allied aircraft in the fight than ever before, NATO also confronted an unanticipated but extremely serious problem: it quite simply began to run out of targets and thereby means to further pressure the Bosnian Serbs.⁷⁷ Only a few days into the campaign, NATO planners began to warn that the approved target list could be exhausted in as few as forty-eight hours.⁷⁸ As early as September 10, air planners were down to nine Deadeye air defense targets and sixteen Deliberate Force Bosnian Serb Army targets; the Combined Air Operations Center (CAOC) thereafter actually began to reduce the number of attack sorties as the number of approved targets dwindled in order to avoid running out of targets to hit.⁷⁹ By the end of the day on September 13, NATO was down to eight approved targets remaining of any type.⁸⁰

NATO air commander Lieutenant General Michael Ryan reported at this point that only two to three days of "make work" fixed targets remained to

strike, increasingly exposing air crews to risk for little military benefit.⁸¹ In fact, when NATO aircraft had unexpended ordnance but no available targets, they reportedly would strike a bunker complex—dubbed "the CNN target" by some—that NATO targeters had added outside Sarajevo solely for the benefit of television news cameras pointed in that direction. "We used that target as a backdrop for noise," one NATO general commented. "When we wanted to make some noise around Sarajevo, when we'd run out of targets, we'd go hit [that] target."⁸²

By mid-September NATO therefore faced the serious dilemma of whether to further expand the target set to include the Option 3 targets, intensifying pressure on the Bosnian Serbs but also increasing NATO's direct involvement in the Bosnian civil war.⁸³ As one diplomat put it, "This really would be crossing a Rubicon. To go at targets Bosnia-wide would make it much more difficult to say you're not at war with the Bosnian Serbs." A senior NATO commander phrased the same idea differently: "We're almost out of Schlitz as far as what we can do here. . . . It has not achieved the result we hoped it would with Mladic. Now it's about time for the politicians to tell us what to do next."⁸⁴ As both the NATO commanders and the politicians knew all too well, an expanded air campaign risked increasing the chances of collateral damage and casualties, enhancing rather than reducing Bosnian Serb civilian willingness to resist, and exacerbating Russian opposition.⁸⁵

Realistically, the Option 3 target set expansion may have been a valid military alternative, but it was not a politically viable one. Adding new categories to the target set would have required further authorization not only from the North Atlantic Council in Brussels but also from the UN Security Council in New York. In light of Russia's outrage at the NATO campaign and its Security Council veto power, the likelihood that NATO operational commanders would ever get dual key authorization to expand the campaign to include Option 3 targets was essentially zero.⁸⁶

Mid-September was therefore a decisive moment for all the parties in this multifaceted conflict. With the air campaign stalling, only two days of targets remaining, and virtually no likelihood of UN support for an expanded target set to further pressure the Serbs, NATO faced the disturbing prospect of an open-ended air campaign against an already depleted target deck that had not compelled surrender. It also faced the challenge of maintaining a coalition with a spectrum of views on the merits and conduct of the campaign along with the daily prospect of a single errant bomb causing a mass-casualty event that would further undermine fragile political support for the operation.

Meanwhile, on the ground, Bosnia's Croats and their Croatian backers were having unprecedented success on the battlefield, with the prospect ahead of even greater gains into territory that had never been part of the traditional ethnic Croat lands. Bosnia's Muslims were making lesser gains at greater cost than their nominal Croat allies, but having already paid an enormous butcher's bill in the war, they were clearly willing to continue. With the Bosnian Army now finally on the advance, particularly in the far west, the Bosnian political leadership was prepared to press on regardless of the cost. Bosnian prime minister Haris Silajdžić replied, "The army is not like a telephone receiver that you just hang up. . . . We are liberating territory." Bosnian foreign minister Muhamed Sacirbey had an even simpler explanation of the Sarajevo government's view: "The best diplomacy is made on the ground."

The Bosnian Serbs Concede

In the zero-sum equation of this war, the Bosnian Serbs were at this point the clear losers, being rolled back on land by the Croat-Muslim alliance and taking a beating from the air that they could continue to endure but not effectively counter. In both domains—western Bosnia and the Sarajevo exclusion zone—the Bosnian Serbs were losing and likely to lose more. There was no realistic prospect of major support from Belgrade, or more indirectly from Moscow, that could halt or reverse this trend. From the Bosnian Serb standpoint, even if the NATO air campaign was not having immediate, decisive effects, it still made sense to accede to the international demands to lift the heavy weapons siege of Sarajevo and remove NATO as an adversary, thereby allowing the reeling VRS to better reorganize its defenses and focus its efforts exclusively against the combined advances of the Croatian, Bosnian Croat, and Bosnian Armies.

On September 14, 1995, Bosnian Serb civilian leader Karadžić and military commander General Mladić signed a joint communiqué in Belgrade, witnessed by Serbian president Slobodan Milošević. ⁸⁹ The Bosnian Serb statement agreed to halt VRS offensive operations and remove all heavy weapons from the Sarajevo exclusion zone within six days, open two key roads into the Bosnian capital for UN and humanitarian aid traffic, and allow unrestricted use of Sarajevo International Airport. Although the Bosnian government was not a party to the agreement, the statement also specified that the Bosnian Army would not attack from inside Sarajevo to take advantage of the VRS

equipment withdrawal and that the ARBiH would provide an inventory of its (much smaller) heavy weapons holdings inside the Sarajevo exclusion zone. The communiqué also referenced planned cease-fire talks with the Bosnian government.⁹⁰

The following day, September 15, NATO overall commander Admiral Smith and UN military commander Lieutenant General Janvier issued a joint press statement indicating they were suspending the NATO air strikes for seventy-two hours to assess the level of Bosnian Serb compliance with the agreement. By September 21, five days had elapsed with no serious violations and visible evidence that the Bosnian Serbs were complying with the agreement. Approximately 238 VRS heavy weapons had been observed departing the exclusion zone along specified removal routes, with additional overhead observation intended to deter any efforts to bring the weapons back in. At this point, NATO and the UN formally declared that "the resumption of airstrikes is currently not necessary." Operation Deliberate Force was over.

UNPROFOR commander Lieutenant General Sir Michael Rose later admitted (borrowing a phrase from the Duke of Wellington) that it was "a close-run thing." And indeed it was: Deliberate Force had been perhaps two or three days from completely exhausting its Option 1 and 2 target lists, having the UN Security Council block approval for expansion to the Option 3 target set, and ineffectually and perhaps indefinitely trying to find and destroy singleton tanks and artillery pieces under clouds and trees. But as the Duke of Wellington himself would no doubt have observed, close-run or not, Deliberate Force had still reached a successful conclusion. The campaign may not have been entirely good, but it had been good enough.

THE AFTERMATH

It is important to remember that the Deliberate Force air campaign ended neither the fighting on the ground nor the war itself. Intense ground battles continued right up until Bosnia's final cease-fire went into effect on October 12, 1995, as both sides jockeyed for position knowing that peace negotiations were ongoing. In western Bosnia a Bosnian Serb counterattack from September 20 to September 22 halted and partially rolled back the lightning advance the ARBiH Fifth Corps had just made. In response, the Croatian Army again intervened with another combined HV/HVO operation, "Juzni Potez" (Southern Move), launched on October 8. More than 10,000 Croat troops, supported by armor and artillery fire, drove through disintegrating

VRS formations as close as fifteen miles from Banja Luka, western Bosnia's largest city. A revitalized Bosnian Army also took the offensive on October 9, with a combined Fifth and Seventh Corps offensive that took Sanski Most and held it against VRS counterattacks. A country-wide cease-fire agreement took effect on October 12, and although fighting would continue in western Bosnia until October 20, the long and bloody Bosnian civil war was finally over.⁹⁵

It is important to note that the official and publicly stated purpose of the NATO air campaign was solely to induce compliance with UNSC resolutions related to Sarajevo and not to influence Bosnian Serb willingness to negotiate for a comprehensive peace—or, even less, to support the ongoing Croat-Muslim ground campaign. That said, there were inevitably linkages between the military and diplomatic efforts ongoing at the same time. ⁹⁶ While the specific goal of the air campaign was the removal of the VRS heavy weapons from the Sarajevo exclusion zone, Western political leaders also made it clear that broader goals included deterring further Bosnian Serb military advances and prompting greater Serb flexibility at the negotiating table. ⁹⁷

U.S.-led peace talks between the presidents of Bosnia-Herzegovina, Croatia, and Serbia began on October 31 in Dayton, Ohio, and would continue until the terms of the Dayton Peace Agreement were accepted on November 21.98 This peace agreement was formally signed in Paris on December 14, allowing UNPROFOR to be replaced by a NATO-led Implementation Force (IFOR), which began its peacekeeping mission on December 20, 1995. The peace agreement, reached exactly two months after the NATO air mission's conclusion, has held to this day.

OBJECTIVES VERSUS OUTCOMES: OPERATION DELIBERATE FORCE

The objective of the NATO air campaign as initially enunciated was "to reduce the threat to the Sarajevo safe area and to deter further attacks there or on any other safe area." A later, more complete statement articulated the objective as "attaining the compliance of the Bosnian Serbs to cease attacks on Sarajevo and other safe areas; the withdrawal of Bosnian Serb heavy weapons from the Total Exclusion Zone around Sarajevo, without delay; complete freedom of movement of UN forces and personnel and NGOs; and unrestricted use of Sarajevo airport." NATO secretary general Claes stated publicly on August 20, 1995, that the main purpose of the operation was to reduce the Bosnian Serb threat to the remaining UN safe areas, particularly the Sarajevo safe

area. A week later NATO's overall operational commander, Admiral Smith, announced there were three required conditions that the Bosnian Serbs would have to meet to lift the air attacks: (1) stop attacking the safe areas, (2) withdraw the offending heavy weapons from the 20-kilometer Sarajevo exclusion zone, and (3) allow UN personnel and vehicles delivering humanitarian aid complete freedom of movement.¹⁰¹

On the specific UN and NATO demands related to Sarajevo, at the end of the Deliberate Force air campaign the Bosnian Serbs did indeed agree to comply with the UN and NATO conditions articulated: removal of the heavy weapons from the Total Exclusion Zone around Sarajevo, cessation of attacks on the remaining UN-designated safe areas (Sarajevo, Tuzla, Bihać, and Goražde), and opening Sarajevo International Airport and the major roads into the capital. However, any discussion of Deliberate Force is complicated by the reality that a variety of unstated objectives and implied challenges existed, including the goal of restoring UN and NATO credibility, the simultaneous need to manage relations with Russia, and the desire to help set the conditions for successful peace negotiations without overtly assisting any of the factions in the conflict. When considered against these other goals and conditions, Deliberate Force measures up relatively well.

As a means of restoring UN and NATO credibility after the humiliations and debacles earlier in 1995, the Deliberate Force operation should be considered a success; after more than three years of brutal civil war in Bosnia, including such outrages as the Bosnian Serb massacre of thousands of Bosnian Muslim civilians in the Srebrenica enclave, NATO weighed in for the first time with an aggressive and sustained air campaign. The reality behind the scenes may have been an air campaign on the verge of crisis for lack of targets, one that was having only a limited effect on its adversary, but the perception was that the NATO operation had achieved success, and both NATO and the UN emerged as more credible afterward.

Perhaps the greatest unstated challenge NATO faced was maintaining the delicate military balance between the Bosnian Serbs, Croats, and Muslims as another round of negotiations was approaching. In effect, NATO leaders were trying to level the playing field enough to compel greater Bosnian Serb compliance but without inflicting so much destruction that the Bosnian Muslims and Croats could exploit a newfound military advantage. As one senior defense official said, "It's a delicate balance we're attempting to strike, sort of like trying to perform surgery with a blunt instrument. We're trying to impress upon the Serbs this is the time to strike a deal, while keeping the others

from exploiting the situation."¹⁰² Or, as one NATO official said at the time, "Our aim is to protect the victim in Bosnia and make him somewhat less of a victim, but not convert him into a winning warrior."¹⁰³

OVERALL ASSESSMENT

Operation Deliberate Force did play a role in lifting the siege of Sarajevo and eventually ending the war in Bosnia. But a close look at the facts shows the NATO air campaign was a less important factor than the actions of the non-NATO forces shedding blood on the battlefield. The strategic campaign against fixed infrastructure targets was well-executed but failed to have any decisive effect. Little effort was directed tactically against Bosnian Serb-deployed weapons or equipment, and almost none were destroyed. Airpower was just one of a convergence of factors that brought about the peace, and it has been international presence and engagement on the ground that has since kept that peace.

The NATO Air Campaign

Operation Deliberate Force was a small operation by the standards of modern war; factoring in the bombing pauses, only twelve of the twenty-two calendar days of the air campaign actually had combat flight operations against ground targets. During the Deliberate Force campaign, NATO aircraft flew some 3,535 total sorties, of which about 2,444 flights were by shooters; of the ground attack sorties, 1,372 were CAS or other bombing missions, and about 785 more were SEAD missions. 104 Only about 800 of the Deliberate Force air sorties actually fired or dropped ordnance during their missions. 105 Of the 1,026 bombs dropped, 708 (about 70 percent) were precision-guided munitions. 106 In addition, more than 300 unguided bombs, 13 Tomahawk land attack cruise missiles and 56 high-speed antiradar missiles, 10,486 aircraftfired cannon rounds of 20mm or more, and 20 2.75-inch rockets were fired during the campaign. 107 Approximately 56 fixed targets were struck, including some 338 subsidiary desired mean points of impact (DMPIs).¹⁰⁸ In total, the volume of munitions dropped amounted to fewer than 500 tons of ordnance expended, and the entire Deliberate Force air campaign in Bosnia amounted to slightly more than a single high-tempo day of operations during the Desert Storm air campaign against Iraq. 109

On the ground, the Rapid Reaction Force played a relatively minor sup-

porting role during the Deliberate Force campaign. Although RRF guns fired more than 1,200 shells in the first two days of the campaign in the area around Sarajevo, even NATO acknowledged that the shelling had little effect on the well-hidden Bosnian Serb heavy weapons around the capital. ¹¹⁰ In fact, as early as the bombing pause a few days into the campaign, NATO leadership had concluded that the RRF's efforts to strike individual VRS heavy weapons were proving futile, owing to the difficulty of locating targets and the risk of collateral damage in civilian areas. ¹¹¹ The RRF did occasionally engage individual VRS targets around Sarajevo during the remainder of the campaign, but since some 238 VRS heavy weapons (of an estimated 250 to 300) were observed withdrawing from around Sarajevo, and as observers did not find large numbers of destroyed weapons left behind, it seems unlikely that the RRF guns inflicted any serious damage on the VRS forces within their range. ¹¹²

The Sarajevo Exclusion Zone

I am satisfied they are cooperating.... After they are away 12 miles, I don't care where they go.

—Lieutenant Colonel Pierre Briere, UN military spokesman, observing the VRS heavy weapons withdrawal, September 19, 1995

Operation Deliberate Force undoubtedly influenced the Bosnian Serbs' reluctant decision to withdraw their heavy weapons from the Sarajevo exclusion zone, but the concurrent ground offensives by the HV, HVO, and ARBiH also had a major impact on their decision to concede on the UN/NATO Sarajevo ultimatum. The HV/HVO Maestral offensive was gaining ground in western Bosnia at exactly the same time, while the Bosnian Army operations Hurricane in the Ozren Mountains and Sana 95, which would ultimately capture Bosanski Petrovac and Ključ in western Bosnia, began just as the NATO air campaign was beginning to run out of targets. The air campaign was causing the VRS pain, but by capturing critical territory, the HV, HVO, and ARBiH ground offensives were threatening the very body of Republika Srpska itself.

When the Croatian/Bosnian Croat Maestral offensive began pushing the VRS back on the ground—and after the Bosnian Serbs received international guarantees that their Bosnian Muslim opponents would not immediately seize Serb-held territory around Sarajevo once the heavy weapons

were withdrawn—there was already reason enough for the VRS to remove its heavy weapons from the exclusion zone. Yielding to the UN on this point had become an increasingly necessary choice for a Bosnian Serb military confronting too many opponents at once. While there is little question that the well-executed NATO air campaign helped change the Bosnian Serb position, it seems likeliest that it merely tipped the scales farther in the direction of losing pride and saving weapons, particularly since these same weapons could simply be moved away to fight elsewhere in Bosnia.

Deliberate Force's Impact on Bosnian Serb Strategic Infrastructure

Although the NATO bombing campaign struck almost all the fixed strategic targets it had on its target list, Deliberate Force ultimately had merely a marginal effect on the overall course of the war. This was in part because the Bosnian conflict continued only a few weeks after the end of Deliberate Force, so any strategic damage to munitions depots or repair facilities had little time to demonstrate what might have been long-term effects. But the Bosnian Serb military garrisons bombed were almost entirely vacated, and there is no particular evidence that strikes against ammunition bunkers or ordnance factories resulted in catastrophic losses to stockpiles or what would have been irrecoverable damage to infrastructure. Indeed, the UN and NATO explicitly avoided targeting any VRS barracks locations that might have resulted in extensive casualties; within any large military complex, only support buildings such as storage areas and vehicle maintenance facilities were carefully chosen as potential targets.¹¹³

The NATO air campaign was intended to disrupt Bosnian Serb command and control links, to destroy warfighting supplies and infrastructure, and to disrupt lines of communication; against these objectives the air campaign was at best only partially successful. Despite a dedicated campaign from the first to last days of the air operation to destroy VRS command and control nodes, the Bosnian Serbs nevertheless displayed the ability to direct operations strategically, operationally, and tactically despite any degradation that may have been caused. They already had dispersed much of their munitions and supplies to remove them from the likely targeted facilities and position them closer to the frontline forces regardless of the air threat, so any destruction again appears to have been limited.

Although the NATO campaign successfully damaged or eliminated most of the targets it set out to hit, the VRS was able to continue combat operations

against its Muslim and Croat opponents during the entire aerial campaign. Overall, the Bosnian Serbs' combat capabilities were certainly degraded during Deliberate Force, but the VRS still functioned as a coherent military force throughout its operational area. Even in the midst of the air campaign, the VRS was able to execute corps-level movements and reorganizations and keep its forces supplied in a high-intensity battle on a lengthy and rapidly moving front.

Deliberate Force's Effects on Bosnian Serb Army Field Forces

Simply put, Operation Deliberate Force did not substantially degrade the combat capabilities of the VRS, but this is largely because destruction of field-deployed VRS forces was never a primary objective of the campaign. It is essential to bear in mind that the air campaign was never directed at Bosnian Serb fielded forces other than heavy weapons within the Sarajevo exclusion zone. Perhaps two dozen or so Bosnian Serb heavy weapons were destroyed in the NATO bombing and RRF artillery shelling around Sarajevo: less than a tenth of the heavy weapons in the exclusion zone, and little more than 1 percent of the VRS heavy weapons inventory nationwide. The air campaign's effect on field-deployed VRS military forces was therefore negligible compared to the battlefield losses then ongoing in the fight against the HV, HVO, and ARBiH.

It is also noteworthy that the HV, HVO, and ARBiH battlefield gains in western Bosnia cannot be attributed to NATO air support except in the most indirect sense. The NATO air campaign was intentionally disconnected from the Croat-Muslim ground campaign, as NATO visibly sought to distance itself from the perception that its air campaign was intended to assist any faction or factions in the civil war—even if the consequences clearly did. Had NATO airpower forced the VRS to conceal its heavy weapons and limited its ability to move forces where needed, the Bosnian Serb battlefield advantages would have been more severely eroded, but this was not the effect the air campaign had, since those deployed forces were not targets. NATO airpower did not destroy the Bosnian Serb tanks or artillery that allowed counterattacks in critical sectors, did not prevent retreats along roads or reinforcements from reaching the front, and did not stop logistical resupply of fuel or ammunition. If anything, these points all reinforce the argument that it was the role of ARBiH, HVO, and HV forces gaining ground independently that forced the Bosnian Serbs' hand rather than the role of supporting airpower.

CONCLUSION: THE VALUE OF HIGHLY CAPABLE PROXY FORCES

From the standpoint of the NATO international interveners, the final outcome after the combined NATO air campaign and Croat-Muslim ground offensive remains a qualified success, meaningfully contributing to the specific goal of securing VRS heavy weapons withdrawal from around Sarajevo but doing much less to advance the Serbs to the negotiating table at Dayton. Despite all the political and operational challenges Deliberate Force faced, the campaign did eventually help compel Bosnian Serb compliance with the Sarajevo exclusion zone ultimatum; the stated goal of removing the estimated 250 or so heavy weapons around Sarajevo was achieved with some 238 heavy weapons monitored and verified departing. More broadly, although the NATO air factor played some role, it was the Croat-Muslim ground campaigns that were the decisive factor influencing the Bosnian Serb and Serbian decision to accept what became the Dayton Peace Agreement.

The peace achieved in late 1995 still stands, albeit still somewhat shakily, more than twenty years later. Critically, this is hugely due to the continuing presence of international peacekeepers and the sustained international engagement they helped enable. The initial IFOR one-year deployment of some 60,000 peacekeepers was more than a third of the international troops at the height of the Iraq or Afghanistan surges, for a country a bit more than one-tenth the population of either of the others. A year later IFOR transitioned to the Stabilization Force (SFOR), with an initial troop rotation of 31,000 peacekeepers—about half the size of IFOR. When NATO turned the Bosnian peacekeeping mission over to the European Union's EUFOR-Operation Althea in December 2004, nine years after the peace agreement, there were about 7,000 international peacekeepers present. In February 2007 that number was further reduced to 1,600 peacekeepers. Twenty years after the Dayton Peace Agreement was signed, there were still six hundred European peacekeepers in Bosnia.

Keeping the peace did not come cheap. The United States' cost alone for just the first year of IFOR mission was approximately \$2.5 billion to deploy the U.S. Army's First Armored Division with some 18,000 soldiers. This far exceeded the less than \$500 million costs of not only the U.S. contribution to the Deliberate Force air campaign but also all other Bosnia-related missions in 1995. By 2012, seventeen years after the war ended, the United States had spent roughly \$15 billion in Bosnia, about 90 percent of which covered

the cost of the more than ten years of American peace keeping troop deployments. $^{114}\,$

Thus, in the case of Bosnia a peace was achieved with a fairly small contribution of NATO bombs, and the battlefield gains were won by a critically large number of Croat and Muslim boots. But in very large measure that Bosnian peace has since been maintained by an expensive and continuing commitment—albeit a diminishing one—of international boots on the ground, still there more than two decades later.