LOSSES IN THE FIGHTING IN IRAQ
By Lt. Col. Yossi - Chief of Investigation Branch

During the period of intensive combat between 20th March and 15th April 2003, the Coalition forces lost 26 aircraft (the number includes manned and unmanned aircraft). The rate of loss of aircraft was one aircraft per 1,900 sorties, which was a pleasant surprise considering the dangers, the pressure and the difficult environmental conditions in the fighting in Iraq.

Most of the crashes were the result of accidents and not of operational hits. Similar data, of accidents during combat, also existed in previous confrontations, in Afghanistan for example. Following are the details of the orbat that was destroyed:

- 8 combat helicopters - 6 of the Apaches (AH64D) and two Super Cobras.
- 7 attack helicopters - one CH-58, one CH-46, two Sea Kings, one UH-1 and two Black Hawk.
- 6 combat planes - Tornado, Harrier, F-14, F-18, F-15 and A-10.
- 1 Transport plane - Viking
- 4 unmanned aircraft - two Phoenixes and two Predators.

Of the aircraft that crashed, three incidents involved fatalities (total of 36 killed). In seven incidents the crews were rescued, and one AH-64 fell into captivity on 23rd March 2003. Three helicopters were downed by enemy fire: one Apache, one Black Hawk and one Super Cobra. In addition, one A-10 plane was downed apparently by a Roland when it flew over Baghdad. The unmanned aircraft were also apparently brought down by enemy fire.

In addition, in the course of the fighting, a number of combat helicopters were hit by anti-aircraft and small arms fire. About 30% of the helicopters that were hit were not returned to service immediately but only after a lengthy period of repairs.

On 24th March 2003, 27 Apache helicopters were hit (of 34 that participated in battle). One of the helicopters was hit by an RPG, and returned to land with only one active engine. Only 11 of these helicopters were returned to active duty.

On 30th March, two Apache helicopters were hit by small arms and by 57mm fire. One of the pilots was injured.

31st March, a number of Apache helicopters were hit by small arms fire. One pilot was injured in the face. The helicopter’s weapons system was hit and it could not return fire.

Hits by Friendly Fire:

According to initial date, two coalition planes were hit by Patriot Missiles (a Tornado was hit on 23rd March and an F-18 was hit on 2nd April). The incidents being investigated both from the IFF perspective and the and from the perspective of launching practices. Regarding air-to- surface attacks, a number of incidents were reported: an F-16 that attacked a Patriot battery that it had locked on to and an A-10 that attacked British armored vehicles as well as the attack on a convoy of Kurdish fighters which also included members of the Coalition forces, claiming 18 dead and 45 injured.

These data are taken from periodicals and media publications and only some of them were officially presented by the Americans. Therefore they must be regarded with caution. These are, of course, partial and initial data, and it would be prudent to wait for the end of the investigation and the publication of the information.
FIRE POWER IS PREFERABLE TO MANPOWER

Why was the number of casualties among the United States Forces in the last Gulf War so low?

By Col. (Ret) Oded Marom

The war in Iraq will be remembered as an outstanding example of strategic planning and tactical execution by a strong, large army having at its disposal a wealth of combat and logistic means that completed its mission with fewer dead and injured that in any other war. The American military authorities reported on 84 killed in battle and 45 victims of accidents and other causes. This war was mobile, quick and the forces met fewer enemy forces that in the previous Gulf War in 1991 when 20 soldiers were killed by mines; not one was killed in this manner in 2003. The reason for this low casualty rate has its roots in drastic change in the philosophy of strategic and tactical planning and the development of modern and efficient combat means. The battlefield enjoys improved communications and is equipped with the latest medical equipment. The Americans' new way prefers firepower of manpower.

To illustrate the improvement in the security of the American soldier: in the Vietnam War the Americans lost an average of 18 soldiers a day for seven years, while in the Iraqi War of 2003, they lost only an average of 3 per day. (In World War II they lost 221 soldiers a day for four years)!

What was the cause of the high survival rate of the Coalition Forces in the Second Gulf War?
1. The air force strike — combat helicopters and planes attacked the Iraqi army forces far beyond the front lines serving as a base of Intelligence sources, the use of advanced weaponry and rescue operations.
2. Personal military equipment — the United States Army improved every item of the soldier's equipment over the past several years. The American soldier is equipped with a lighter weight and more efficient helmet, night vision equipment, reliable communications equipment, satellite communications and lethal ammunition.
3. The planning dictated that the forces should attempt not to enter heavily populated areas or military camps.

The Number of Fatalities in United States Wars
In the Civil War, 1861-1865, there were 214,983 fatalities. In World War I, 1917-1918, there were 53,402 fatalities. In World War II, 1941-1945, there were 291,402 fatalities. In the Korean War, 1953-1959, there were 33,741 fatalities. In the Vietnam War, 1964-1973m there were 47,414 fatalities. In the Gulf War, 1991, there were 47 fatalities.

Safety in War
Of the 22 losses of Coalition planes (see details further on), 14 were accidents not caused by enemy fire, and the causes of four others have not yet been determined. Only four of the losses were identified and certified as resulting from enemy fire. With all the sophistication and progress, American soldiers suffered losses from
friendly fire by Coalition Forces. The number of dead from friendly fire is put at five.

A Comparison of the Number of America Fatalities in the Gulf Wars

From Accidents - 120 in 1991 compared to 31 in 2003
From Air Accidents - 110 in 1991 compared to 17 in 2003
20 in 1991 compared to 0 in 2003
From Mines;
From "Friendly Fire 10 in 1991 compared to 5 in 2003.

LOSSES IN THE SECOND GULF WAR — 2003

The following is a list of Coalition aircraft lost in the war in Iraq in 2003

21st March — CH46 — Suddenly observed nose-diving and crashing (apparently an accident) 12 killed (4 Americans, 8 British). The mission to airlift forces by helicopter was cancelled because of the accident. Region of the incident - Kuwait — Attack helicopter — Marine Corps — Result: 12 fatalities — Cause: an accident.
22nd March — 2 Sea King helicopters — Collided over the Gulf, the first after take-off and the other in the final to aircraft carriers. 7 killed (6 British and 1 American) — Region of the incident - the sea — Attack helicopter — British — Result: 7 fatalities — Cause: an accident.
23rd March — Tornado 4GR — Downed by a Patriot missile on the Iraqi-Kuwaiti border on the way back from an operational sortie. Initial findings indicate that the IFF was functioning but for some reason the Patriot identified it as Foe. Two crew members were killed. — Region of the incident - Kuwait. Combat plane. — British - Result: two fatalities — Cause: an accident.
24th March — Apache — forced landing near Karbala — possibly a technical mishap/ or enemy fire. Two crew members were captured. Several attempts were made to destroy it by an F14 as well as by an MLRS battery. It was ultimately transferred by truck on 4th April 2003 — Region of the Incident - Iraq — Attack helicopter — Army — Result: 2 POWs. Cause not determined.
25th March — Apache — Disappeared during a flight in a sand storm, with visibility limited to 100 meters, near Nasaraya. The helicopter's fate is not known. Region of the Incident - Iraq — Combat helicopter — Army — Results not known — Cause: an accident
25th March — Black Hawk — Disappeared during a flight in a sand storm with visibility limited to 100 meters — Near Nasaraya — The helicopter's fate is not known. Region of the incident - Iraq — Combat helicopter — Army — Results: not known — Cause: an accident.
27th March — Predator — This unmanned aircraft was photographed at sea near the shore, it may have run out of fuel. It is not known when the photograph was taken. Region of the incident: the sea — unmanned aircraft — USAF — Results: not known. Cause it not known.
28th March — Predator — Downed by anti-aircraft fire while flying over Baghdad. Over Iraq. Unmanned aircraft — USAF — Results are not known, cause is not known.


30th March — UH1 — Crashed after take-off at a deployment base in southern Iraq. Three people were killed. Region of the incident - Iraq — Attack helicopter — Marine Corps — Results: 3 three killed — an accident.

31st March — Harrier - In the final. The engine apparently stalled and the plane fell into the sea. The pilot was injured. Region of the incident — the sea, Combat Plane — Navy — Result: rescued — Cause: an accident.

31st March — Apache, crashed on landing because of heavy dust storm. The tail wheel touched down first and the helicopter rolled to the left and crashed. Was to have accompanied a xxx helicopter. Region of the Incident — Iraq — Combat helicopter — Army — Result: no casualties — Cause: an accident.

1st April — Viking S-3 — After landing apparently because of technical difficulties, it started along the runway and fell off the deck of the aircraft carrier. The two crew members abandoned the plane suffering mild injuries. One of them suffered burns on 8% of his body. Region of the Incident — the sea — a Transport Plane — Navy — Result: crew rescued — Cause: an accident.


2nd April — Black Hawk — Crashed south of Karbala, apparently hit by enemy small arms fire — Region of incident — Iraq — Attack helicopter — Army — 7 killed and 4 injured — Cause: a hit.

2nd April — F-18 downed in the Karbala region, apparently by a Patriot missile that had locked onto an Iraq ground-to-ground missile. The pilot abandoned the plane before it hit the ground. A number of rescue attempts were made until 6th April. Region of the incident Iraq — Combat plane — Navy — Results: 1 killed — Cause: accident.


8th April — A10 — Downed by a ground missile (Roland?) over Baghdad. Two more A10s were hit in that same attack flight. One made an emergency landing in a field that had been captured, and the other (flown by a woman pilot) succeeded in returning to Kuwait. Region of the incident Iraq — Combat plane — Service branch not given — Result: crew rescued. Cause: a hit.

10th May — Black Hawk — Apparently crashed after colliding with a high tension line north of Baghdad — Region of the incident: Iraq — Army — Result: 3 dead and four injured — Cause: an accident.

Friendly Fire:

24th March — F-16 — Attacked by a Harm missile, an American Patriot battery stationed at Al-Najaf, after the Patriot battery had locked onto the plane.

28th March — An A10 mistakenly attacked British armored vehicles. One soldier was killed.

6th April — A combat plane mistakenly attacked a convoy of vehicles carrying Kurdish fighters. 18 soldiers were killed and 45 injured, after the plane had been scramble on a mission by the Special Forces.