

LOST & FOUND

Nick Wotherspoon of the Lancashire Aircraft Investigation Team details the loss of a Junkers Ju 88 in the Second World War and recounts how major components from the bomber were recovered some 76 years later.

BELOW A view of the burnt-out wreckage littering the marsh. Many of the major components proved to still be in situ as shown in this photo – albeit 10 to 15 feet below the surface. (RUSSELL BROWN COLLECTION)

Although the cities of Manchester and Liverpool suffered badly from bombing by the Luftwaffe during the Second World War, the northwest region of England saw relatively little aerial combat. This means that the few incidents that did take place have received considerable attention from modern-day amateur historians, but one had always eluded all those who



DUNN

have attempted to find it – the crash site of the Junkers Ju 88 shot down over the Ribble estuary marshes. Members of the Lancashire Aircraft Investigation Team (LAIT) began to research the incident in the early 1980s, including interviewing many witnesses to the event or its aftermath. However, early visits to the marsh only highlighted the sheer size of the potential search

area as well as the inadequacies of metal-detecting equipment available at the time. It was not until the late 1990s that we began to search seriously for the crash site.

HITLER'S SPRING OFFENSIVE

Spring 1941 saw a renewed Luftwaffe bombing campaign against Britain, directed mainly ▶



LEFT
Oblt Klemm (R)
at the controls of
a He III in 1940.
(KLEMM FAMILY VIA
RUSSELL BROWN)

BELOW
The test pit going
in over the first
magnetometer
contact. Note
the size of the
marsh area in the
background and
lack of features.
(ALL IMAGES
VIA AUTHOR
UNLESS STATED)



RIGHT
Crews from 256
Sqn crews by
one of their
Defiants. Flt Lt
West sits on the
wing – top row,
furthest right
and Sgt Adams
stands bottom
row, third left.
(RUSSELL BROWN
COLLECTION)

against the country's major ports, and the night of 7/8 April 1941 was a busy one, as 517 enemy aircraft were involved in operations against the Clydeside/Glasgow port areas. One of these raiders was Ju 88A-5, 8138, Code 'B3+IN' of II Gruppe, Kampfgeschwader 54, based at Saint-André-de-l'Eure in Normandy, France. It was one of seven Ju 88s from II/KG54 that took off on the evening of 7 April, destined for Greenock – the primary target for some 200 raiders that night – and was loaded with two SC500 bombs mounted on its external bomb racks. The flight crew comprised 30-year-old Oblt Gunter Klemm (pilot), Lt Heinrich Coster (25, navigator), Fw Alfred Hofmann (26, radio operator) and Fw Hermann Ilse



RIGHT
The burnt-out
wreckage
of the Ju 88
scattered across
Banks marsh.
(RUSSELL BROWN
COLLECTION)



(25, flight mechanic). On reaching the target area they found it obscured by dense cloud and although 97 aircraft did attack, Klemm's crew and some 100 other raiders were ordered to continue to secondary targets, most heading towards Liverpool and Bristol.

At around 11.30pm Klemm's Ju 88 was approaching Liverpool, flying in a clear, moonlit, sky at 10,000ft (3,000m), with a cloud layer below at around 5,000 to 6,000ft. Also, in the area were several RAF night fighters on patrol – Defiants from 256 Squadron, based at Squires Gate near Blackpool. In fact, not far from the Ju 88, one of these night fighters was in serious difficulties, as Defiant N1694, piloted by Flt Sgt J Stenton, with his gunner Sgt W Ross had suffered a

BELOW
Day one of the
dig underway.





the direction indicated and saw what he described as an “ugly-looking silhouette” approximately 1,000ft below them and to their port side.

Once positively identified as a Ju 88, West dived and manoeuvred his aircraft until he was about 150 yards (137m) below and 200 yards to the starboard side of the raider. With the enemy crew apparently unaware of the night fighter’s presence, West ordered his gunner to open fire and Adams put a two-second burst accurately into the starboard engine, which immediately caught fire. Return fire came from the German’s upper rear gun position in several short bursts, all of which passed well above the Defiant. West then closed to 100 yards and Adams fired a one-and-a-half-second burst, ►

LEFT

The largest recognisable section of the Ju 88 after the crash. Amazingly this proved to still be there, but only the anodised spars and fuselage structure had survived.

(RUSSELL BROWN COLLECTION)

major electrical failure. By 11.30pm they were completely lost and running low on fuel, so descended through the cloud down to 4,000ft but, still unable to verify their position, they decided to abandon the aircraft. Stenton made a safe descent, but Ross was badly injured, with a broken leg and fractured skull and was not expected to survive. Fortunately, he did recover, but it would be a long time before he returned to duty. Defiant N1694 impacted on farmland at Halsall near Southport at 11.45pm, bursting into flames and by the next morning, when curious locals came to view the wreck, there was little recognisable left.

VIEW TO A KILL

At 11.43pm another 256 Squadron crew, waiting at readiness at Squires Gate, was ordered to take off and patrol at 10,000ft over the northwest coastal area. On board was Flt Lt Donald West (pilot) and Sgt Reginald Adams (air gunner), both aged 20 and their aircraft was Defiant I N3445, coded ‘JT-F’. Both were relatively experienced on the type – West having flown his first sortie in August 1940 with 141 Squadron and Adams with 264 Squadron in September. They had joined No.256 in December that year, being paired as a crew and with West becoming ‘A’ Flight Commander. At 11.45pm their aircraft climbed above the cloud layer and continued to 10,000ft, where they began to circle, but seeing nothing, West decided to head towards the anti-aircraft barrage which was active over Liverpool. As the shell bursts appeared to be at his height, he climbed to 11,000ft and continued for several minutes. Suddenly Adams reported an aircraft below silhouetted against the cloud layer. West immediately looked in



LEFT

Part of the engine visible at bottom of the test pit, with the author for scale.



ABOVE
LAIT team stop to examine the recovered main wheel and tyre..

RIGHT
The data plates are still visible on one of the ETC500 external bomb racks.



By this point West was forced to break away to port as the crippled raider began to dive towards him. He then turned steeply in order to position his Defiant to the Ju 88's port side for another attack, but no such coup de grâce was needed, as suddenly the bomber went into a steep dive and entered the cloud layer below. On board the Ju 88 the situation must have been chaos – the aircraft was well alight and described by witnesses on the ground as resembling “a flaming streak” as it dived out of the base of the cloud layer. The crew attempted to jettison the bombs and prepared to bail out. First to leave was Lt Coster, followed by Klemm, the pilot, who

RIGHT
The VDM Propeller and other wreckage revealed during the first excavation.

again targeting the starboard engine, which became engulfed in flames and the Ju 88 began to lose speed. West then manoeuvred the Defiant ahead of and slightly below the Ju 88 and proceeded to cross from side to side. Again the night fighter came under return fire, this time from the upper front gun position but, as before, this passed harmlessly above them and Adams responded with two, one-and-a-half-second bursts of fire into the cockpit, noting the explosive ‘de Wilde’ bullets (probably British Incendiary B.VI bullets) he was using exploding in the glazed nose of the enemy aircraft. The return fire immediately ceased.



was badly wounded, and then Fw Hofmann, who for reasons unknown took one of the aircraft's radio sets with him when he jumped. Fw Ilse did not leave the aircraft, probably having been killed during the engagement.

The falling bomber was heading in a northerly direction towards the town of Lytham, but turned as it passed over the Ribble estuary and impacted on the edge of the marshes bordering the south side of the river near the village of Banks. The Defiant followed its victim down through the cloud layer, emerging just in time for West and Adams to observe a vivid red flash on impact and then witness the blazing wreckage as they continued back to Squires Gate, landing at 12.12am.

AFTERMATH

At around midnight numerous locals, who had been alerted by the sound of the combat overhead, witnessed the Ju 88 explode as it struck the marsh with such force that many assumed the bombload had detonated. Press reports the following day spoke of "a pyrotechnic display" with numerous explosions and coloured lights bursting from the blazing wreck.

Three civilians from Lytham waded out across the river channel, which was at low tide, towards the burning wreckage. However, on hearing shouts for help, they found the wounded pilot, Oblt Klemm, with his right arm badly smashed. They carried him back to the shore, where he was handed over to the police and taken to Lytham hospital. On the south side of the river members of the home guard and police set out onto the marsh towards the crash site and began a search for the crew.



LEFT
Peter Masters, a forensic archaeologist and research fellow from Cranfield University, measuring out the grid for a geophys survey.

“On board the Ju 88 the situation must have been chaos – the aircraft was well alight and described by witnesses on the ground as resembling “a flaming streak””

Meanwhile, Lt Coster, who had landed close to the main river channel, was making his way towards the flames, when he was found by two members of the Home Guard and taken to Banks police station. Next morning, the remains of Fw Ilse were found amongst the scattered wreckage of the aircraft and Fw Hofmann's parachute and radio set were recovered by the Lytham St Annes lifeboat crew from a sandbank in the estuary. No body was found and he was eventually washed ashore on 15 May and was buried as an unknown airman at Lytham St Annes cemetery. In the meantime the remains found at the crash site had been buried at Southport (Duke St) Cemetery under both men's names, probably to allay any possible public panic that an enemy airman might be on the loose.

Both casualties now lie at the German Military Cemetery on Cannock Chase in Staffordshire.

Both surviving German airmen were initially taken to No.1 Prisoner of War Camp at Grizedale Hall in the Lake District and Klemm was transferred to No.13 Prisoner of War Camp at Shap Wells Hotel near Penrith in May 1942. Due to the extent of his injuries he was repatriated to Germany as part of a prisoner exchange scheme in 1943. Lt Coster was transferred to Canada to No.30 Prisoner of War Camp at Bowmanville by Lake Ontario. Coster was transferred back to England in May 1946, returning to Germany six months later; he passed away in 1971. After the war Klemm flew as a pilot in the re-formed German Air Force and retired with the rank of Lieutenant-Colonel; he died in 1972. ▶

BELOW
Team members and guests with the results of the first day of the dig.
Note: the starboard engine is behind the safety barrier.



RIGHT
The 'lost' second engine successfully recovered. From left to right are Nick Wotherspoon, Antony Eric Watkiss, John Robson and Russell Brown.
 (ALAN CLARK)

On the night of 7/8 May 1941, one month after the destruction of the Ju 88, Flt Lt West and Sgt Adams shot down another Liverpool raider, He 111 2908 'G1+HP' of 6/KG55, which crashed near Wrexham. They were again flying Defiant N3445. West went on to be awarded the DFC in September 1944 and eventually retired from the RAF in 1961 with the rank of squadron leader; he died in 2012. Sgt Adams was transferred to Bomber Command when the Defiants were withdrawn from night fighter operations and he joined 405 (RCAF) Squadron at Pocklington, East Riding of Yorkshire. On the night of 29/30 June 1942 he was the rear gunner on Handley Page Halifax II W1113 'LQ-G' for a bombing raid on Bremen, but over the Netherlands the bomber was shot down by a night fighter and all the crew perished. Sgt Adams was 21 and is buried in the churchyard at Noordwolde, Weststellingwerf, in the Netherlands.

RIGHT
After inspection by EOD, the SC500 proved to be burnt out.

MIDDLE
Section of wing spar being lifted on day two of the dig, including complete inter-fuselage support structure.



FINDING THE PAST

Banks Marsh, where the Ju 88 fell, is now managed by Natural England as a national nature reserve and is a designated a Site of Special Scientific Interest. It provides winter feeding grounds for large numbers of migratory birds and nesting in spring, so access is restricted. Our efforts in finding the Ju 88 during the 1990s focused on an area indicated by several witnesses but, without fixed landmarks, such memories proved unreliable and we were also plagued by problems with our detection equipment due to the ground conditions. Later grid searches with

two Foerster vertical gradient magnetometers proved more reliable, but still without success.

We decided in 2015 to reassess all the evidence and have one last all-out effort to find the crash site. Original photographs were re-examined, along with 1945 aerial survey photos of the marsh. Information gleaned from these was used to establish the 1940s outline of the area, which was then overlaid onto a modern aerial photo, forming the baseline for a renewed grid search. This resulted in a major contact being detected, using Foerster magnetometers, only a few metres from the baseline. A probe rod confirmed a solid object at a depth of approximately 5ft and, following discussion with the reserve manager, approval was given to investigate further.

ENGINE FIND

A few weeks later a limited test pit revealed a crankshaft still attached to a major portion of a large alloy cased engine, which was positively identified as a Junkers Jumo 211 before the site was reinstated. The complex task of organising a full-scale excavation began, taking into account the sensitive environment of the marsh. In preparation we required a full geophysical survey of the site and were very fortunate to have enlisted Peter Masters, forensic archaeologist and research fellow from Cranfield University, to do this using a Bartington Single Axis Gradiometer. The results revealed the full extent of the buried wreckage and allowed us to plan our excavation to minimise disturbance of the surrounding area.

Once our project proposal was approved by Natural England, we required a licence from the MoD

BELOW
Excavation of the second engine proved more difficult as the already disturbed ground made the sides of the hole unstable.
 (ALAN CLARK)



“But once on the surface it rolled out of the digger bucket on to the grass and we immediately realised that we were looking at an SC500 (Sprengbombe-Cylindrisch 500kg) general purpose bomb!”



before we could proceed; we needed to demonstrate that the Ju 88's bomb load had been accounted for. Fortunately, the Air Intelligence reports of the time were specific, confirming that only two bombs had been carried and that both were found in the wreckage, one partly detonated and one unexploded. Therefore the licence was issued, conditional on all work ceasing should anything suspicious be found and recommending that an Explosive Ordnance Disposal (EOD) team should attend.

With all formalities completed, the excavation was scheduled to take place over two days in early July 2017. EOD were briefed but were unable to attend due to the security situation at the time, while a film crew from Emporium Productions was invited to record the dig as part of a documentary series for the History Channel. Numbers on the marsh crash site had to be limited, but we managed to accommodate a couple of VIP visitors, including Guy Salkeld, archaeologist with the Ministry of Defence, and Col Hermann Hanke, Air Attaché at the German Embassy in London.

The first day of the dig went mostly to plan, with the first excavation

opening over the engine we had already identified. Although ground conditions were good, with little water ingress, we quickly found that as expected the edges of any excavation soon became unstable and the recovery of artefacts by hand was simply not an option. The digger operator had been directed to dig around larger items and was briefed how best to lift each item to avoid damage. Several of our team took up positions to monitor the spoil as it was removed to ensure no smaller objects were missed. Soon we had recovered two ECT500 external bomb racks, a complete flame damper unit and the fire-damaged starboard Jumo 211B engine.

Below this, we uncovered parts from the dive brake operating system, a main undercarriage leg, various airframe sections, mainly from the engine nacelle area and a VDM propeller hub, with two alloy blades still attached. At around 10ft, with no more aircraft remains present, the excavation was back-filled, taking care to preserve the stratification of the material removed. We then moved to the next contact but confusingly there appeared to be few aircraft remains present. We continued deeper and at 15ft a tyre tread was

revealed and carefully uncovered, proving to be a complete main wheel.

SECOND DAY OF DIGGING

Day two began with the excavation of a major magnetometer contact that we anticipated must be the second engine. Again, little was found until, at about 10ft down, one of the steel reinforced centre section wing-spar beams was located, embedded vertically, closely followed by a second beam and a quantity of airframe remains. It appeared that the orientation of these beams had probably resulted in the very strong magnetometer readings. With no sign of the engine, we re-examined the geophys survey and noted that nearby there was partial coverage of a further contact on the edge of the survey area. Fortunately, Tim Schofield of Suffolk Archaeology was attending the dig as part of Emporium Productions' team, and happened to have his geophys equipment with him. We were quickly able to extend the gradiometer survey to cover the area, which revealed another major contact.

A new excavation was opened and at 8ft down a probe rod was used to guide the machine operator. ▶

ABOVE

Loading the first day's finds for their journey off the marsh after 76 years.



ABOVE
 Cleaned parts from the Ju 88 laid out at an open day event at 'Hangar 42'. The structure to the centre is the top section of the rear fuselage complete with virtually all the dingy stowage bay.

This showed that substantial wreckage lay only another couple of feet below and we proceeded accordingly, soon revealing another pair of steel fuselage wing beams, still joined by the spar structure. These were partially lifted so that straps could be attached and when pulled clear proved to include more than 20ft of wing spar. Shortly after this, the machine operator indicated he had made contact with a large object, but due to water ingress in the now 12ft-deep hole, we could not identify what this object might be. Once on the surface, it rolled out of the digger bucket on to the grass and we immediately realised that we were looking at an SC500 (Sprengbombe-Cylindrisch 500kg) general purpose bomb!

This was, of course, the signal to close down the dig, notify the police and clear the site pending the arrival of EOD. Later on site we were very

pleased to find the bomb was on the surface – not still in a mud-filled hole! Within an hour, the all-clear was given and the bomb proved to be, just as our research had indicated, completely burnt out and was declared free from explosives.

Unfortunately this meant the end of our excavation for the time being as the plant equipment was booked elsewhere, leaving us only time to reinstate the site. It was not until the beginning of September that we were able to return, thanks to the generosity of a local firm, John Robson Metals, who offered to provide the necessary plant equipment to enable us to finish the project. In the meantime we had re-surveyed the site and although no new contacts were located, we were surprised to discover that our second excavation had, in fact, missed the intended magnetometer contact. However, the signal was much clearer

and easier to pinpoint, as interference from other nearby buried objects had been removed.

MORE SUCCESS

On reopening the dig, we had to proceed carefully as the refilled previous excavations threatened to make the sides of the new one unstable. The first large object found was the second main undercarriage leg, then at around 12ft an even larger object was located just as the bottom of the hole began to fill rapidly with water. The digger driver worked quickly and was able to manoeuvre the object onto the bucket and, as it was lifted, the distinctive profile of a large 'v' configuration engine was revealed, complete with propeller hub still attached – the second Jumo and a satisfactory conclusion.

Since the dig, members of our team have been kept occupied conserving and cleaning the finds to get them ready for public display. One engine, its propeller, the 500kg bomb and smaller artefacts have already been on display at the Atkinson Centre in Southport and generated much interest. We are now liaising with the museum at their request to place a smaller permanent display there and other local venues are also being considered for temporary exhibitions so that as many local people as possible will get an opportunity to view the finds.

But the likely permanent home for the majority of the remains will be our newly refurbished exhibition room, located at the 'Hangar 42' museum at Squires Gate, in an original wartime hangar that once housed the Defiants of 256 Squadron. ☺

RIGHT
 Cleaning an engine from a dig is always a messy business and these needed further work to treat any remaining salt contamination, then many hours to remove the concretion adhering to numerous parts.
 (ANTONY ERIC WATKISS)

