
Other airmen who had adverse experiences with the B-24 fuel system can advise us of their own fuel system horrors.

Primitive Repair Facilities

The numbers of serviceable aircraft for each mission varied too, due to the repairs needed to make the planes air worthy after receiving battle damage. Because of its longer range, the B-24 was needed in many theaters of war, impinging on the number of replacements available to any one group. Squadron maintenance was undertaken by crew chiefs and helpers who worked without shelter, rain or shine. It was the rule rather than the exception in the 484th that most of the aircraft would sustain some damage from the dreaded flak both slight and heavy on each mission. Most engine change tools were hand made or adapted from what was on hand.

Flying in a straight line to maintain formation order, mandated flight routing directly into flak bursts just ahead or above just prior to and on the bomb run. The steel fragments (shrapnel) would nick the props, punch holes into the pushrod covers causing oil leakage and lacerate the fuselage bottom with holes and rips. Spent shrapnel would bounce off the thin aluminum skin sounding like pebbles falling on a tin roof. All of this required inspection and repair.

Luftwaffe Ju-88s Bomb Bari Harbor

The shortage of supplies and parts for use by the 15th AF came about because of a very effective attack on Allied supply ships lying at anchor in the harbor at Bari, Italy on the Adriatic coast by Luftwaffe Ju-88s in December of 1943, just two months and a half after the establishment of the 15th Airforce itself. Many of the supplies intended for the new Airforce ended up at the bottom of the harbor. They were not easily removed because of the contamination caused by exploding gas shells. Thus the midnight auto supply came into being. Mechanics and armorers had to beg, borrow, or steal from outlying sources. Damaged B-24s uneconomical in time and material to repair were soon cannibalized. It was known that lesser quality stovebolts were sometimes substituted for high strength A&N hardware, and so it goes.

Hung Bombs

Documentation of repair procedures of aircraft and components were distributed through "Tech Orders" in the Army Air Corps, but were not usually transmitted from one command to another. As an example, bombs would not always drop when selected to do so. The shackles that secured the bombs to the aircraft would often freeze depending on the severity of the weather encountered at bombing altitudes. It was not unusual to encounter 30 below temperatures. The coldest temperatures were encountered nearest the bomb bay doors so the lowest bombs would freeze and the others above would leave their protective arming wire and fall sharply in a heap on top of frozen bombs. Thus leaving the upper bombs live when only a slight jar would set them off.

Hung bombs were probably first encountered by the English based 8th Air Force because the 8th AF had been established earlier and had flown many tough missions before the Fifteenth AF became operational. It is not known if a fix was ever found,

and if there was, a quick way to pass on this information to other commands, it was not easy, and at best there was no time to wait for conventional mail. With the satellite not yet invented this is understandable. Without the quick transfer of information to both the 8th AF and the 15th AF, they were to suffer the same problems.

Freezing of bombs as can be seen from the foregoing was a very dangerous condition with loss of life and/or loss of the aircraft heavily threatened. To face this problem in the heat of combat with flak bursting all around and without tools or prior instruction required quick thinking. The idea, of course, was to get rid of the damn things in any way one could which meant there was no control as to when the bomb would drop and, because of the delay the assigned target was far away by then. The possibility of other aircraft below was always there. Casualties caused by falling bombs on other aircraft were not unusual. Which all brings the story back to what was said earlier, better know your equipment thoroughly. Comments on hung bombs from other flight crews and armorers are welcomed here too.

The Dreaded Flak Guns

In the Italian based 15th Airforce, anti-aircraft (flak) accounted for more casualties than fighter planes. Bomber crews feared the dreaded 88mms and higher caliber flak cannons with a passion. When flak jackets became available, extra sets were brought on board not only to wear but to sit or stand on. The need for protection from below needs no explanation.

Because the enemy needed to protect the oil refineries and installations, flak cannons were mounted on railway flat cars and were moved about as needed but also to fool our intelligence (S-2). The flak trains were often hid in railway tunnels at night for just this purpose). The next day they would be somewhere else.

Late in the war when the fuel situation was becoming acute for the Axis Powers the more mobile guns such as the versatile 88s were moved from the eastern front and placed aside the oil refineries, such as Brux, Moosbeirbaum, Odertal, and Vienna. The 88 had a high mount that permitted elevation of the gun barrel for use as a flak gun and as well as fire against tanks, making it a dual purpose weapon. In the larger cities flak towers were erected so the gunners could have free fields of fire. On the top of the towers, 88s as well as larger caliber guns were installed behind well protected concrete barriers. Some of these steel and concrete structures still stand.

The Luftwaffe was also charged with the responsibility of defending German occupied territory from the ground as well as from the air. In reality the Germans were defending three fronts after June 6, 1944, The Western Front, The Eastern Front and the Air Front overhead. Over 1,000,000 men were assigned to the defense of the Reich. They were aided also by civilians, including high school students. The Allied oil campaign began to have effect on fighter activity in mid 1944 and the capture of Ploesti by the Russians, at about the same time fuel production dropped drastically. The fighter attacks on the bomber streams began to weaken sharply. Anti-aircraft fire was more intense than ever. In these desperate times the Luftwaffe also sent its jet fighters into action against the bomber streams with deadly effect. Fortunately for the USAF, and unfortunately for the Luftwaffe, the jets were few in number and not quite battle proved.