

The Evolution of British 'Bowie' blade bayonets

Derek Complin ©

November 2023

One

Although not officially approved for service until 12 September 1944, collaboration between the government Armament Design Department and the Wilkinson Sword Company had been ongoing since November 1942 to develop a suitable knife bayonet for use with the Enfield No. 5 rifle. The result was the bayonet, No.5 Mk.I, initially produced with a single grip retaining nut and screw.



Early in 1945, at the insistence of Wilkinson, the No.5 Mk.II bayonet was adopted, with grips retained by two nuts and bolts. The change made fitting the grips easier and more secure. Wilkinson states that quantities of the Mk.I were re-gripped before issue.



This blade design precipitated a long line of bayonets for the Enfield No.4 rifle, the Sten gun, Sterling s.m.g. and L1 (SLR) rifle.

Two

The manufacture of the No.5 bayonet and scabbard continued to be contracted out to a number of suppliers, Wilkinson being the most prolific with a total production of 188,354 by March 1945. Viners Ltd. and Elkington of Birmingham supplied limited quantities.

Wood grips secured by two screw bolts prevailed. Production ceased by the end of 1945.



Further requirements were supplied by the Royal Ordnance Factory in Pool, Dorset. Blades were stamped with P contained within a circle, and the year of production.



In 1947 the No.5 bayonet was declared obsolete, remain supplied put into storage for later issue with the L2 Sterling carbine.

The No.5 continued to be produced by the Indian Government through the 1970s for issue with the Sterling carbine. Blades were stamped with the year and R.F.I. (Rifle Factory Ishapore). The overall specifications duplicate those of the British made No.5.



Three

Although the No.5 bayonet was declared obsolete in 1947 by British armed services, the popularity of the bowie blade ensured there was an attractive commercial and export market for this style of bayonet.

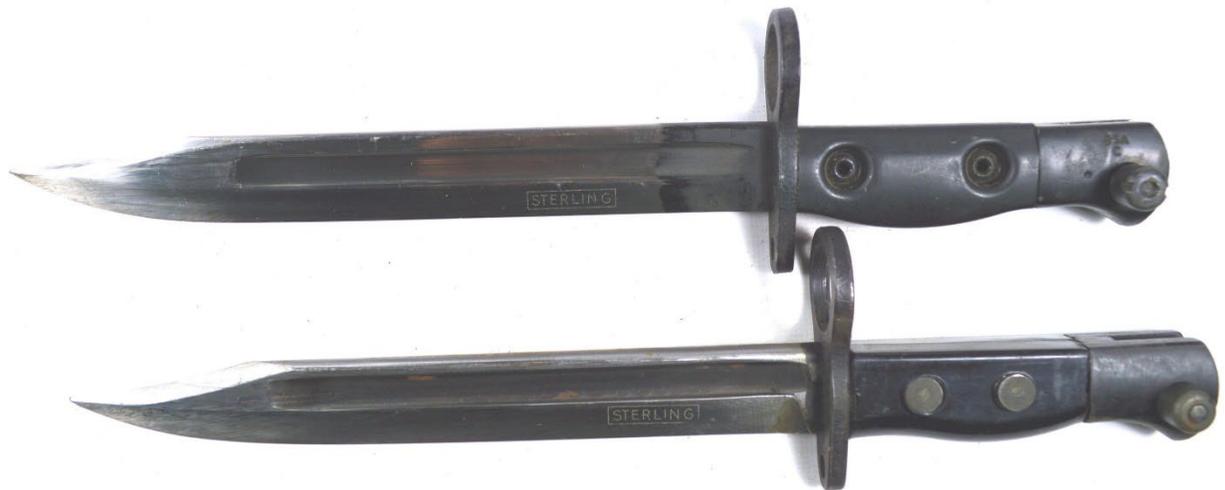
A number of manufacturers took advantage of production facilities already in place, resulting in a variety of No.5 bayonet clones, with wood, plastic or steel grips, large or small muzzle rings, but all with round pommel slots. All those encountered lack a clearing hole drilled into the pommel.



A steel and plastic grip version have been noted with STERLING engraved on the blade.



The overall finish on these bayonets is not up to the standards demanded by the British ordnance system.



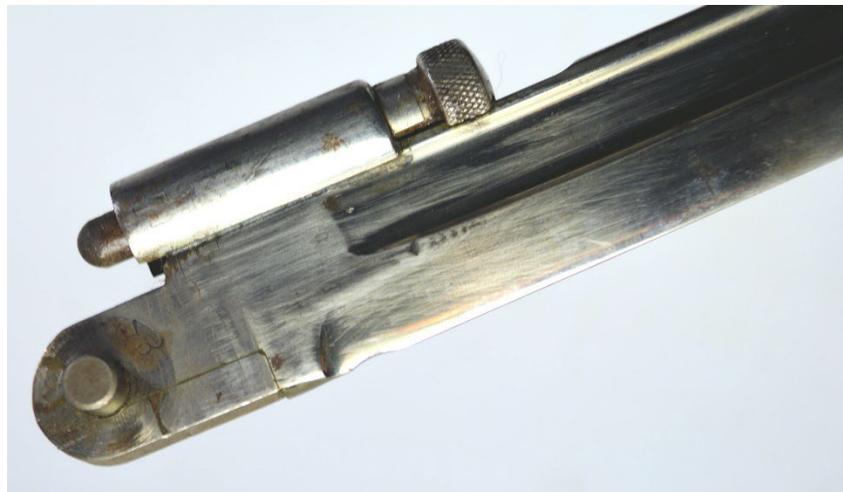
Four

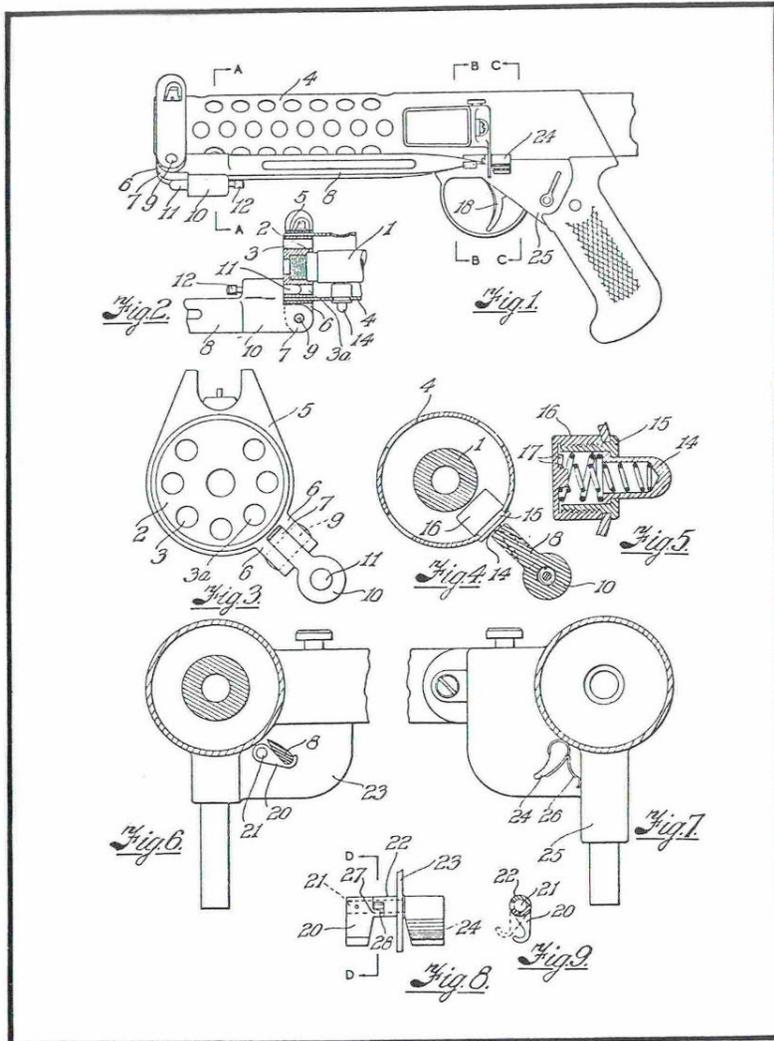
During the latter part of WW2 a new British machine carbine, the Patchett, was developed by Sterling Engineering Works of Dagenham, Essex, who had produced many of the Lanchester carbines. A number of bayonet concepts were considered for the Patchett carbine, including a folding bayonet.

A small quantity of No.5 bayonet blades were modified and fitted with a hole to permanently attach to the underside of the barrel housing. When swung forward, a spring loaded lug locked the blade into place.



The system was patented by Sterling, and although a small quantity were produced, the concept was abandoned and never adopted.





The Patchett machine carbine was more commonly known by its maker's name, Sterling, and was introduced into British Service in 1953 as the L2A1, complete with the standard No.5 bayonet.

Patent drawing courtesy the late R.D.C. Evans "British Bayonet Letters Patent 1721-1961"

PLATE 126: GEORGE WILLIAM PATCHETT and THE STERLING ENGINEERING CO LTD. Patent No. 583092 of 13 March 1944.

Five

When I embarked on this series, the history of British bowie blade bayonets seemed reasonably easy to lay out. But following the much maligned No. 4 'spike bayonet, the popularity of the blade shape appear to have been universal, and its adoption came in many iterations.

Sequentially, the next bowie style blade was the No.6, essentially a No.5 bayonet with a P1907 hilt proposed for use with the No. 1 rifle (SMLE).



Although drawings and specification were produced at RSAF Enfield in 1944, the bayonet is something on an enigma. A total of probably no more than half a dozen were produced for the purpose of testing. Apart from two known examples in private collections, all have disappeared. The concept was never advanced, and there was never any general issue.

The No. 6 illustrated above is a composite fabrication of a No. 9 bayonet blade, and a P1907 hilt, but is shown to illustrate the concept.

Commercially made versions do exist, with an overall unfinished appearance, and according to opinion were supplied to Israel for use with the No. 1 (SMLE) rifle.



No original source documentation has been found to support this opinion. Should anyone have access to appropriate records, it would be appreciated hearing from them.

Six

The genesis of the No.7 bayonet occurred at a meeting convened by the Wilkinson Sword Company at their offices in February 1944. Attended by officials of the British Government and Military, the objective was to initiate a bayonet design merging the No.4 socket and the No.5 bayonet blade. The result from this meeting of minds was the No.7 bayonet (below) surely one of the more complicated bayonets in history.



For those interested in the full history, the definitive reference is contained within the *Spirit of the Pike* (2003, Uppem Publications), the ultimate work on bayonets for the No.4 Enfield Rifle, authored by Graham Priest.

The No.7 bayonet was the marriage of a knife blade with an ergonomically designed hilt containing mechanical

elements that enabled it to fix to either the No.4 rifle or the 'Carbine, Machine, Sten, 9mm, Mk.5'.

Wilkinson producing 1,000 prototypes in early 1944. Just where these prototypes ended up is unclear, but it appears most were scrapped in the 1950s. The identification of these 1,000 Wilkinson bayonets has been hampered by not having a physical example to examine. But in recent years at least three No.7 bayonets have been found with sufficient differences from the production bayonets to draw the reasonable conclusion they were made by Wilkinson. The following illustrates these differences.

Manufactured from Tufnel composite, grip colour varied



considerably throughout the production of No.7 bayonets. However the Wilkinson grips (left) appear to be Bakelite.



The most obvious difference is the location of the grip bolts, set further into the hilt on the Wilkinson (bottom).

With one small exception, the Wilkinson bayonets are totally unmarked. The only to be found is a small number 4 inside the front of the socket. It is visible when the socket is in the 'fix bayonets' position. The



marking stamped only swivelled two other

known Wilkinson examples are numbered in the same location.



The right side regular production No.7 bayonets was stamped with the wartime dispersal code, in this example M78 for maker Elkington, and a War Department Broad Arrow. The Wilkinson example is blank.

The left side of production bayonet blades bears the pattern designation, No.7 Mk 1/L. The Wilkinson is blank.



Other differences are more subtle. Nevertheless, they set the Wilkinson (bottom) apart from regular production bayonets. The socket locking pin is a bolt, not a slot head screw.

Perhaps the most subtle difference is a comparison of how the muzzle rings are finished. The production bayonet has a chamfered finish on the inside of the ring, like all No.5 bayonets I've examined. Indeed, this would lead one to

suppose that, although the No.7 muzzle ring did not actually function as such, they were simply drawn from existing supplies, and assembled accordingly.

The Wilkinson muzzle ring (right)

is not finished, but simply a stamping. Note the lack of a chamfered edge. All three known examples of a Wilkinson have the same crossguard finish.



Finally, the casting of the socket on the Wilkinson is smooth, compared with production bayonets, which display a distinct ridge.

Officially designated the No.7 Mk.1/L on 4th April 1944, general production commenced with a number of suppliers contracted to deliver some 330,000 units. Orders for the supply of No.7 bayonets was placed with Elkington & Co. Ltd., the Royal Ordnance Factories of Poole and Newport, and Birmingham Small Arms Guns Ltd. Wilkinson were not awarded a contract for supply.

Regulation issue No.7 bayonets exist with red-coloured Tuffnel grips, and Black Plastic grips. The purpose of Black Plastic grips has not been established.



Seven

In 1946, Britain, Canada and the U.S.A. started a collaboration to determine an ideal caliber rifle ammunition for common use.

The Royal Small Arms Factory at Enfield was tasked with developing the concept for Britain, which by 1949 resulted in a new, small caliber rifle, the Enfield Model 1 (E.M.1.). As the development advanced, the No.7 bayonet was recruited into the process. A number of prototypes were conceived, with the focus of fixing the bayonet to the barrel securely by fully utilizing the crossguard muzzle ring. This was achieved by simply replacing the original crossguard with one containing a muzzle ring of smaller diameter.



As the project developed, the incorporation of a flash-hider in the crossguard became a final element of what became officially designated Bayonet No.10 Mk.1, for use with the Enfield Model 2 (E.M.2) rifle.



They were subjected to trials, but full production never



undertaken as the entire project was scrapped in 1954 in favour of the F.A.L. 7.62mm caliber rifle and L1A series of bayonets.

The full story of this fascinating history is detailed in the *Spirit of the Pike* (2003, Uppem Publications) authored by Graham Priest, the ultimate reference work on bayonets associated with the No.4 Enfield Rifle.



Yet another design was considered, consisting of a No.5 bayonet with a new crossguard with flash hider prongs. It was never developed beyond the experimental stage.



(Images courtesy of Lee Cousens)

Eight

Development and trials of small caliber rifles continued to evolve from the end of World War 2 onwards with the Self-Loading Experimental Model (S.L.E.M.) in 7.92mm.

A bayonet was designed for the S.L.E.M. based on the No.5, the only difference being the diameter of the muzzle ring. Manufactured at R.S.A.F. Poole in 1946, who were already producing No.5 bayonets, the switch to fabricate the No.8 would have been simple.



In addition to a reduction of the inside diameter of the muzzle ring to 14.8mm, there are two other distinguishing features.





The pommel casting was sub-contracted to the Scottish Motor Traction Co., and stamped accordingly on the end S.M.T. within a diamond.

In addition the crossguard bears the number 29 stamped into the side.

Skennerton (British & Commonwealth Bayonets) puts the total production of No.8 bayonets at 2,400.

Nine

The No.9 was the final sequentially numbered bayonet issued for use with the No.4 rifle and Mk.V Sten carbine.



Produced by the Royal Small Arms Factories at both Enfield and Poole, it was also and contracted out to a number of British manufacturers. The design was copied by Pakistan, and mimicked by South Africa and Italy.

A combination of socket and bowie blade, it was effective for its primary use, but without the hilt, useless as a utility knife.

Those made at R.S.A.F. Enfield were heavily impressed with pattern designation and production date on the side of the socket.



Those made at Poole were impressed on the top ledge of the socket with their 'P' logo and year, and those by commercial



contractors with their old

wartime

Dispersal

Code numbers. Two illustrated here – M49 for Francis & Barnett, M50 for Byfords Ltd.



Ten

Following extensive trials, the 7.62mm Belgian F.A.L. was determined to be the best successor to the venerable .303" Lee Enfield rifle. Manufactured in Britain and designated the Rifle L1A1, general issue commenced in March of 1957.

A number of bayonet designs were also considered and trialed, but ultimately the bowie style blade on the old No.5 bayonet was retained and fitted with a new hilt design.



Produced at R.S.A.F. Enfield, the new bayonet was also designated the L1A1 and issued with the No.5 all-steel scabbard. Two versions of the scabbard existed, the Mk. 1 with an all steel mouthpiece, and the Mk. II with a brass

mouthpiece. Either version was appropriate for the L1A1 bayonet.



The bayonet hilt was fitted with steel grips that were impressed with the designation L1A1, the NATO stores number 960-0011 alongside a Broad Arrow.



Eleven

The L1A2 bayonet was apparently approved as a production alternative to the L1A1. Although some may have been produced in the Britain, examples viewed have all been made in Australia. The most obvious difference between the two patterns is the shape of the blade fullers, which on the L1A2 are rounded at each end, rather than squared. Canada also produced its own version of the L1A1, designated the C1 bayonet.

The L1A1 bayonet attracted early criticism, largely due to the locking bolt in the pommel which protruded sufficiently to render it easy to remove from the rifle in situations such as confrontations and civil unrest.



L1A1 bayonets were upgraded by milling a recess in the pommel and reducing the press stud so that it was flush.

Those treated in this manner were re-gripped, and the new designation applied, L1A3 along with a new stores number 960-0257.





This new designation and the last four digits of the stores number were also stamped into the end of the pommel.

Ongoing manufacture of the bayonet was modified to take into account the recessed press stud. New made L1A3 bayonets can be identified as lack the markings applied to upgraded L1A1 bayonets.



A further version of the L1A3 bayonet was produced in the mid-1960s. The long fuller was found to create a weakness in the blade and make tempering problematic. The fuller was shortened, and a new crossguard with straight sides applied by brazing to the tang, rather than riveted.





The L1A3 designation remained unchanged.

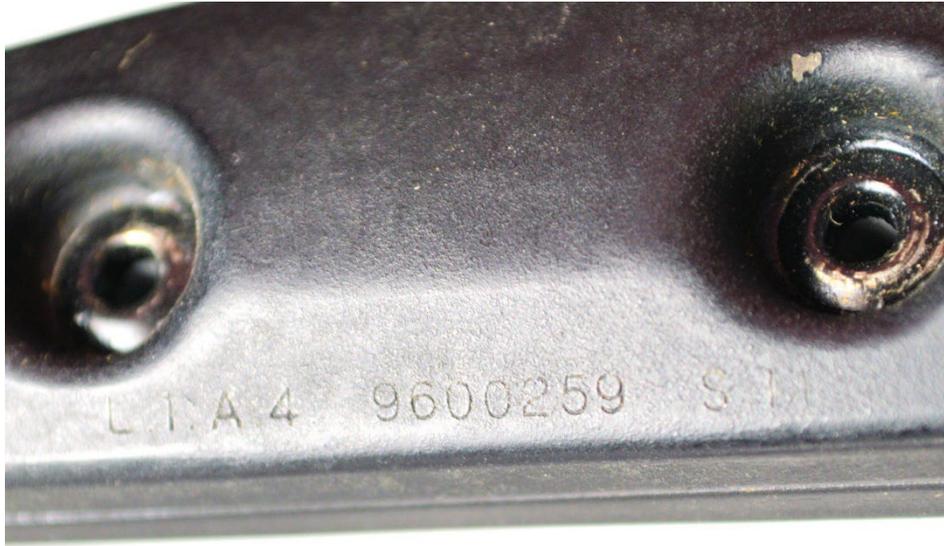
Twelve

The L1A4 was the final version of the bayonet for the S.L.R., and the last use of the trusty 'bowie' blade applied to a British bayonet.



The differences from the L1A3 lay mainly in manufacturing and assembly variances. The L1A4 was produced by Hopkinson Ltd. of Sheffield in the early 70s and their logo and year of manufacture can be found stamped into the blade.





The new designation L1A4 was stamped into the grip, along with a new NATO store number, 9600259.

When Hopkinson finally shut down production and closed their doors, large amounts of bayonet parts in various stages of manufacture were dumped, literally, in easily accessed bins. Collectors who were tuned into these events had the perfect opportunity of helping themselves to these bits and pieces.



This treasure trove of parts gave insight into the manufacturing process, in particular the blade forgings.



From parts retrieved, it was clear that Hopkinson were adept at using components to cannibalize into other forms of familiar bayonet.



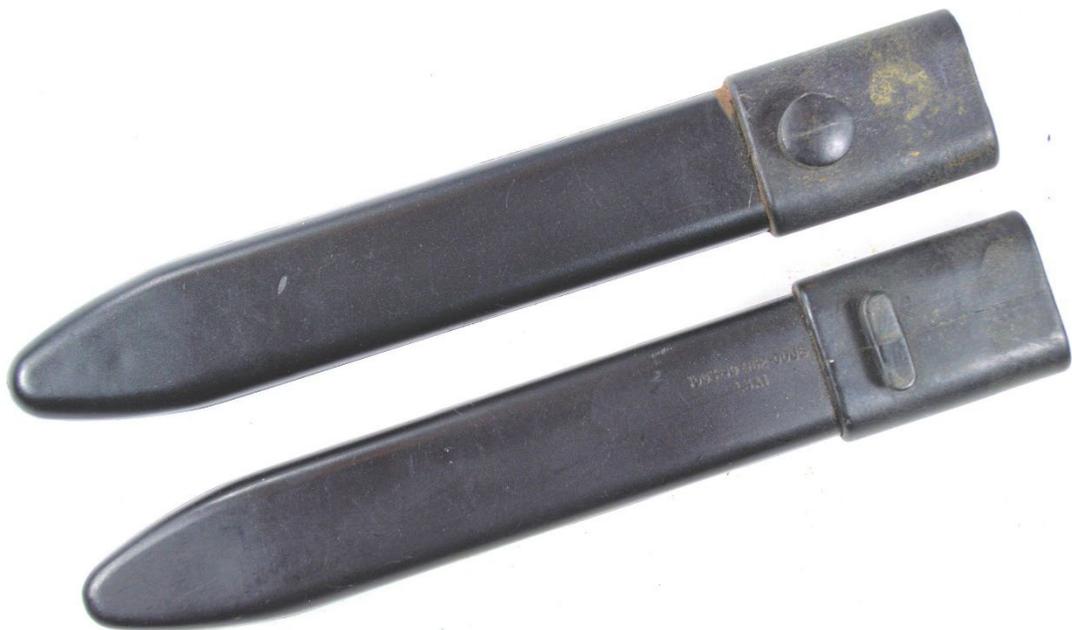
Thirteen

The all-metal scabbard for the No.5 bayonet had endured and served throughout all iterations of the bowie blade bayonets from 1944 through the late 1960s.

But in these latter years, a decision to develop a new scabbard resulted in two versions produced from molded plastic.



The body and mouthpiece are identical in both, but one with a traditional button shaped frog stud, the other with a short bar.



The short bar version made it into official records as Scabbard L3A1, and accorded a NATO Store number, 1905-99-962-0006.



Neither scabbard was ultimately adopted, although versions continued to be trialed during the development and introduction of the new L85A1 service rifle the in 1985.

Fourteen

There will always be modifications and anomalies for dedicated collectors to seek out. I've excluded them from this article, preferring to focus on standard Service issue bowie blade bayonets.

However, there are a couple of 'off topic' items worth examining.

1)

In 1988, to commemorate the bi-centenary of Australia, Small Arms Factory Lithgow prepared a small quantity of hand finished, sectionalized L1A1 rifles in presentation form.





The reverse, showing the cut-away of the rifle.



These were accompanied by L1A2 bayonets with sectionalized scabbards.





2)

Produced specifically for use by Colour Parties in the U.K.,



protective caps for the L1 series of bayonets were designed to prevent the Colours catching on them during parades.

These were not service issue items, but contracted privately by individual units.



3)

The manufacturing process for producing bayonets and scabbards is subject to constant quality control, not only to ensure the best possible performance in use, but to make sure that all parts are fully interchangeable.



This particular item is an aluminium casting, for ensuring that L1 scabbard bodies are within the measurement tolerances set out for their production.

