

GC Precision's Ultra-Precision Gunstocks an Australian Innovation

The platform for extracting the optimum performance from a rifle is its relationship with its stock and precision machined metal alloy stocks are well proven for delivering such performance.

When GUNS was contacted by Canberra-based Gareth Crook and advised that he had started manufacturing high precision alloy stocks locally, it did not take long to arrange to have a look at some GC Precision Development products.

One was Gareth's personal Tikka T3 lightweight in 6.5x55 Swedish Mauser and as luck would have it, a GCPD chassis was available for a heavy barrelled Tikka T3 and I had just such an outfit in .223 Remington in my gun safe that was a known good performer in its original polymer stock.

I was able to pick up the gear shortly after during a visit to the ACT and also get together with Gareth to get some background on his product development.

Gareth took the plunge into his own precision manufacturing business after working for 13 years in the manufacturing and engineering design department of the Australian National University. In doing a lot of development work for ANU's Department of Nuclear Physics in the manufacture of precision scientific apparatus.

Being a long time keen hunter and shooter, and having a wealth of experience in the programming and operation of CNC machines, he took the decision to acquire the necessary tooling and to set up the GCPD business to manufacture alloy rifle stocks out of the best available materials to the highest precision standards, using his hunting and shooting experience to ensure that the products would meet the needs of their end users.

The stocks (Gareth refers to them as chassis) available at the time of writing are for Tikka T3 and Haenel Jaeger 10 rifles at this early stage of operations. There are obviously other options in the planning stages for the more popular makes of rifles used in Australia.

After collecting the assembled 6.5x55 and the package containing the T3 heavy barrel chassis, it did not take much of a look to see that these stocks have been manufactured

without compromise and every part, other than the pistol grip on the test samples have been manufactured in GCPD's factory.

The material specifications are impressive enough.

- The main stock elements are CNC machined from 6061-T651 aircraft grade aluminium alloy.
- The forend, magazine catches and recoil lugs are machined from Å1-4V grade titanium
- All alloy components are hard anodised to Mil Spec MIL-A-8625 certification.

One of Gareth's priorities what to make the stocks as light as possible and this has resulted in a standard stock having a weight of around 1980g. The standard stock has a fixed (bolted-on) butt. A Magpul folding stock option is available but some state firearms jurisdictions do not allow these types of stocks. The Magpul option is around 350g lighter than the rigid version.

There are two forend options, both manufactured from titanium allow. The tube handguard type was fitted to Gareth's 6.5x55, while the more conventional forend came in the kit to fit my heavy barrelled Tikka T3 Varminter.

The 6.5x55 came fitted with a Nightforce SHV 3-10x42 scope while my rifle was already set up with a Barska 6-24 target scope.

Setting up my Tikka with the new chassis had a few tricks to it, but detailed assembly instructions are supplied in the very well packaged and presented GCPD kit. The main trick involved removing one of the polymer side plates from the forend to gain access to the bolt that attaches the forend to the main chassis section.

The Magpul pistol grip also needs to be bolted on and it comes with its own set of instructions. My T3 action was a perfect drop in fit and the close tolerances were obvious when tensioning the action bolts. There is virtually no take-up on the bolts when they are tightened and can only be rotated about half a turn from first engagement to fully tight.

I used my Lyman torque wrench to tighten the stock bolts up to the recommended



The Tikka T3 6.5x55 fitted to the GCPD stock – the inventor's personal outfit.



FROM TOP TO BOTTOM: The kit is it comes ready for fitting to my heavy barreled Tikka T3 Varmint. The only part not made by GCPD is the Magpul pistol grip.

Right side view of the receiver – as much metal as possible has been removed to reduce weight.

The fully adjustable butt – the adjustment rods on the butt plate and cheek piece are titanium.

Both setups handled well. The 6.5x55 (with the tube forend) as the easiest offhand thanks to it light sporter fluted barrel.



55 inch pounds, which is a fairly high torque setting and unlikely to be recommended for timber or polymer stocks unless they are pillar bedded.

No loaded ammunition was supplied with Gareth's 6.5x55 as he had none available at the time. Instead a batch of unprimed Hornady brass was supplied along with a box of Hornady 140gn Ballistic Tips, loading dies and a shell holder. I already had 6.5x55 reloading dies so Garth's were not needed, and I supplied some powder and primers from my own collection.

The .223 was no such problem as I had a plentiful supply of my target handloads and a few boxes of factory loads. My T3 .223 has a 1:12" rifling twist so it does not like bullets over about 60gn. Tikka offers a 1:8" option for its heavy barreled .223's and the faster twist can handle bullets over 70gn without any problems.

Mark Herron from Herron Security and Sport helped me out with the contribution of a box of Hornady 140gn Interlocks and 142gn Sellier and Bellot match loads, and I was able to find some Hornady 140BTHP match loads in my own collection, to complement the handloads. Herrons are also Australian distributors for Haenel Jaeger rifles, so there was a connection there..

As is obvious in the photos, the GCPD stocks are fully adjustable for length of pull and cheekpiece height. Sling swivel studs for QD swivels are also standard.

Having reloaded 6.5x55's in the past, I referred to my reloading notes to come up with a load 36.0gn of AR2208 behind the 140gn Ballistic Tips.

Both rifles spent a bit of time in the bush, but it was a pigless trip, so the testing was confined to the bench. The 6.5x55 easily held sub-MoA groups with the Hornady factory loads and my handloads, but did not like the Sellier and Bellot loads. Given that the 6.5x55 Tikka was the light sporter version with a fluted barrel, such accuracy was impressive.

The .223 lived up to expectations and produced several groups around 1/2 MoA with both my handloads and Winchester's Varmint Special 55gn loads, in less than ideal conditions.

The GCPD chassis for the Tikka T3 is set up to work with original Tikka magazines, which are a removable box magazine that are available in 3 or 5, or 4 or 6 shot options depending on calibre. After market magazines of 10-shot capacity are also available for the .223 class of cartridges.

The GCPD stocks are not cheap, with the full version as tested on my .223 T3 retailing for \$2450. If the Magpul butt option is used, the cost comes down to \$2150. These units



LEFT: The 6.5x55 was fitted with a Nightforce 3-10x42 scope – a good match for the rifle's performance.

MIDDLE: Some of the factory loads used in the 6.5x55.

ABOVE: Hornady 140gn BTHP performance load (bottom) and 140gn Hornady Ballistic Tip handload (top).



are very specialised accessories and will appeal to shooters who want to extract the best performance from their rifle.

They are obviously not made to a price as all the components used are top-shelf and having a close look at the detail in every aspect of the GCPD stocks, the care that has gone into their manufacturing is obvious.

Gareth told me that over 200 hours of programming is required to set up a CNC machine to make a stock for a particular model of rifle, and even on his new CNC machines, it required several hours of machine time to produce a chassis and then it

has to be shipped off to a specialist anodiser for coating.

As I do a bit of hobby machining, I had a rough idea of how much work goes into the design and manufacture of GCPD stocks, and the issue that impressed me most was that someone has been game enough and smart enough to design and manufacture these high quality products in Australia.

For more information on GC Precision Development, contact Gareth Cook on Ph: 0421 353166, Mail: PO Box 5143, Chisholm ACT 2905 or Email: gc.precision.developments@gmail.com. Web: www.gcpsarms.com.

YOUR SCOPE'S WARRANTY DOESN'T MEAN SQUAT IN THE MIDDLE OF THE BUSH.

NXS™ 2.5-10 x 42 COMPACT
Sleek and light in weight, virtually indestructible. The ideal traveling companion.

SHV™ 3-10 x 42
The most affordable riflescope we've ever made.

ATACR™ 5-25 x 56F1
First focal plane versatility. One of the world's premiere long-range riflescopes.

So, your riflescope has a "full warranty?" That isn't going to help you much when you're in the middle of nowhere and your riflescope goes kaput.

Nightforce riflescopes are unfazed by the most powerful calibers, the nastiest environments, the most vicious baggage handlers. You might have a lot to worry about when you're far from civilization, but the reliability of your riflescope will not be one of them.

Of course, Nightforce riflescopes have an excellent warranty. The best warranty, though, is one you will never have to use.

NIGHTFORCE

11 Manton St. ■ Hindmarsh, SA 5007 ■ Australia: 1 800 03 03 08 ■ Intl: +61 8 8440 0888 ■ Learn more at NightforceOptics.com

