



## SHOOTER'S GALLERY

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## .257 Ackley Improved

By his own admission, P.O. Ackley considered the .257 Ackley Improved to most likely be his best wildcat. **BY LANE PEARCE**

A FEW ISSUES BACK, TWO *SHOOTING TIMES* READERS expressed interest in reading about wildcat cartridges and the adventurous experimenters who created them. Coincidentally, I had just embarked on my most recent handloading project with the interesting .257 Roberts Ackley Improved wildcat.

According to P.O. Ackley, the modified .257 Roberts was likely the best improved round compared with the couple dozen or so factory cartridges he'd experimented with. Ackley's signature case modifications included reducing the body taper and increasing the shoulder angle—both significantly!

However, an even more important feature of the typical Ackley Improved (AI) wildcat is that he maintained the shoulder headspace datum of the parent factory round. That allows you to safely fire factory cartridges in the modified chamber. It also means you can easily fireform .257 Roberts factory brass or loaded rounds to achieve the .257 AI case shape, so

you don't need expensive forming dies or go through extensive case-forming steps.

Ned H. Roberts was one of several handloaders who experimented with wildcat cartridges in the 1920s and '30s. He chose the 7x57mm Mauser case to modify and, reportedly, tested myriad configurations before settling on the "perfect" .25-caliber varmint and deer cartridge. Early articles by Townsend Whelen and Jack O'Connor proclaimed the virtues of the .257 Roberts in the hunting fields. Many hunting and reloading articles fondly referred to Ned Roberts's wildcat as the ".257 Bob."

When Remington decided to adopt it as a factory cartridge in 1934, the company made a few minor dimensional changes to preclude firing factory ammo in rifles chambered for the wildcat round. Remington paid homage to the inventor by naming the new factory round the .257 Remington Roberts. The Remington part of the moniker was eventually dropped.

Capable of excellent accuracy and terminal ballistics, the .257 Ackley Improved is an interesting wildcat cartridge.



The current SAAMI spec for the .257 Roberts Maximum Average Pressure (MAP) is 54,000 psi. Winchester introduced a +P version with a MAP of 58,000 psi in the mid-1980s. That's still less than the typical 60,000 to 65,000 psi of comparable modern rifle cartridges.

The .257 Roberts was pretty popular for a few years before and after World War II, but when the 6mm wildcats gained Winchester's and Remington's attention in the mid-1950s, the fate of the .257 Roberts was sealed. Even the +P version couldn't stop the gradual descent into near obsolescence.

### An Accidental Endeavor

I embarked on my .257 AI project almost by accident. While thinning out my firearms inventory, I realized I could convert my Ruger Hawkeye bolt-action rifle chambered for .257 Roberts to .257 AI. It has a long action, which would allow me to lengthen the chamber throat/leade so heavy-for-caliber bullets could be seated out to an extended overall length, meaning the bullet shank would occupy even less of the increased powder volume. Later, when I measured water capacities of a standard .257 Roberts case and several fireformed AI cases, the difference was about 13 percent (60 grains compared to 53 grains of water).

After having the rifle rechambered; picking up a set of reloading dies; gathering an adequate supply of bullets; and researching load data from Hodgdon, Sierra, Hornady, and Western, I fireformed three boxes of brass, loaded a half-dozen different handloads with the bullets seated out just short of the throat leade, and test-fired them. I was pleased with the ballistics, and I lost only one case. Plus, the primer pockets are still tight after at least three firings. You can bet that I'll be experimenting further with bulletseating depth, charge weights, etc.

I want to make readers aware of one special step that's required when handloading the .257 AI. You must anneal the case neck/shoulder to ensure maximum case life. Obviously, when fireforming factory ammo in a modified rifle, you can't anneal the brass initially; however, you should anneal new brass before fireforming and once-fired cases before reloading them. I followed Nosler's instructions shown in its No. 8 reloading manual and achieved excellent results.

The .257 Ackley Improved delivers great ballistic performance. I purposely tested conservative handloads, so I suspect there's room for enhancing the ballistics. **ST**

### .257 ACKLEY IMPROVED ACCURACY & VELOCITY

BULLET	POWDER		COL (IN.)	VEL. (FPS)	E.S. (FPS)	S.D. (FPS)	100-YD. ACC (IN.)
	(TYPE)	(GRS.)					
Custom Ruger Hawkeye, 22-in. Barrel							
Sierra 75-gr. JHP	IMR 4451	53.5	2.80	3468	38	14	1.09
Barnes 100-gr. TSX	Reloder 22	52.5	2.85	3103	109	37	1.28
Hornady 100-gr. InterLock BTSP	IMR 4350	48.0	2.93	3006	29	11	1.07
Hornady 100-gr. InterLock BTSP	IMR 4895	36.0*	2.93	2662	62	21	0.68
Berger 115-gr. VLD Hunting	Hybrid 100V	47.5	3.01	2908	37	17	0.77
Berger 115-gr. VLD Hunting	IMR 8133	57.5	3.01	3006	22	10	0.82
Nosler 115-gr. Partition	H4831SC	50.5	2.97	2945	57	19	1.14
Sierra 117-gr. Spitzer BT	IMR 8133	56.0	2.79	2913	47	18	1.28

\*Used for fireforming cases

NOTES: Accuracy is the average of two or more five-shot groups fired from a sandbag benchrest. Velocity is the average of 10 rounds measured eight feet from the gun's muzzle. All handloads used Remington cases and CCI BR-2 primers.

All load data should be used with caution. Always start with reduced loads first and make sure they are safe in each of your guns before proceeding to the high test loads listed. Since *Shooting Times* has no control over your choice of components, guns, or actual loadings, neither *Shooting Times* nor the various firearms and components manufacturers assume any responsibility for the use of this data.

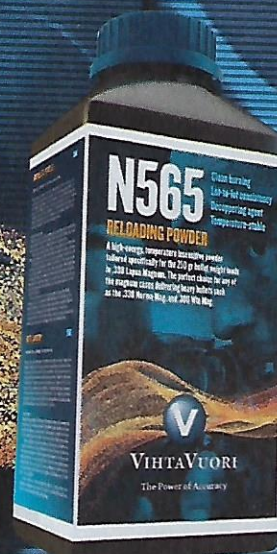


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