

Scope Specs Table

For: 6-24x | 5-30x | 4-20x | 6-20x

Bottom Magni. = 6x or lower

Top Magni. = 20x or higher

with 10y-Side Parallax

Exposed Turrets

Holdoff Reticle

\$200-500(-1000)

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Requirements for this Table (a few exceptions are included)

Bottom magnification = 6x or lower

Top magnification = 20x or higher

Minimum parallax = 10 yards or less (a few exceptions with 15y)

Side parallax adjustment

Turrets = exposed (with a few exceptions with capped turrets)

Reticle = holdoff reticle (evenly spaced hash lines or dots for aiming with holdoff/ holdover)

Price = mostly between \$200 and \$500, but some are quite a bit more expensive, and they are included because they have all around very good specs (e.g., great magnification range; great bottom end FoV; 10-mil turrets, etc.)

Abbreviations in the Table

Green is a good thing... – e.g.: a very good warranty, a shorter size or lighter weight than average for this magnification range, a larger than average elevation adjustment range, a very wide field of view (FoV), or some additional feature (bubble level, zero stop, turret turn counter, numbers on the hash lines of the reticle), etc.

Red is less of a good thing... – e.g.: a not so great warranty, a longer size or heavier weight than average, a smaller than average elevation adjustment range, a very narrow field of view (FoV), or some other negative or limiting feature, like: a small exit pupil (reducing the eye box), a min. parallax longer than 10y, a reticle without illumination, capped turrets, an FFP reticle without thick outside posts, or a price higher than the max. price that was set for this scope table), etc.

Purple is something noteworthy that could be either good or bad, depending on the shooting scenario... – e.g.: an objective lens that is exceptionally small or large for its magnification (e.g., a small lens allows less light to enter, and reduces the need to focus to correct parallax errors), or an exceptionally short or long eye relief (affecting the scope mounting location and eye/head placement), etc.

Orange is a caution flag, a marginal feature or characteristic... – e.g.: warranty limitations, a marginal FoV, a smaller objective diameter for (supposedly) less light than average for the magnification range, an uneven number of mils or moas per turret turn (not multiples of 5mil or 10moa), a 34mm tube (somewhat limiting scope mount choices), a price so low as to shed doubt on the quality of the scope, etc.

SFP vs. **FFP** = table starts with **SFP** (*second focal plane*) scopes, then *first focal plane* (**FFP**)

Thick O/S Posts [for **FFP**] = thick black outside posts, i.e., 3 or 4 of the crosshairs are thick toward the outside (the posts are not hollow rectangles, but filled in with black), which allows seeing the crosshairs easily even when at low magnification. Some have no thick posts, and some have *semi thick* posts.

10x [or 16x, or another number] [for **SFP**] = the magnification at which the holdoff hash lines or dots have been calibrated, i.e., where 1 moa indicated on the reticle actually is 1.047" in reality at 100 yards

Series and Part No. = the manufacturer's product or parts number; helpful to identify the scope at a seller's page as some scopes are very similar and the seller's description is either misleading or insufficient to identify the scope with certainty; also for shopping for the lowest price it helps to enter the number in the search

Discont. = product has been discontinued (but still could be purchased used)

Warranty Info: **Life** = life time warranty | **5y** = 5 years warranty | **OOwn** = warranty only for the original owner | **Unlmt** = unlimited warranty | **Anyb.** = warranty applies to any owner, anybody (e.g., even if you bought it used) | **NoRec.** = no receipt (proof of purchase) required | **Rec.** [or: **R.**] = receipt (proof of purchase) required | **30d** = must register the scope within 30 days of purchase

FoV = Field of View (in ft at 100y): A large FoV at the bottom end of the magnification range is important for *hurried close range shooting*, as the large FoV helps rapid target acquisition. Note that a wide FoV is not critical for *unhurried shooting*, i.e., shooting on stationary targets (or quarry that isn't skittish and gives the shooter time to set up the shot).

The color coding in the table is based on my very personal, unabashedly subjective estimation: *For my kind of hurried close range shooting* I'd like to have a FoV of at least around 3ft at 10y (1m at 10m) (which translates to around 30ft @100y, as FoV is usually reported at 100y; it is color coded black).

The color coding is applied irrespective of the scope's magnification, so naturally 6-24x scopes for example don't usually get a green rating, but orange or red. Note however that there are sometimes huge differences in FoV between scopes with the same magnification range which makes the bottom end magnification an unreliable indicator of FoV when scope shopping.

41ft or more | **40-35ft** | **34-28ft** | **27-22ft** | **21-17ft** | **16ft or less**

IR = illuminated reticle [Y = yes | **NO**]

Reticle; Ret **D** = "dots" = *enough* dots or hash lines on the crosshairs for holdoffs for elevation and windage

N = "numbers" = the dots or hash lines are numbered for quicker holdoffs

Grid = the reticle is a grid style ("Christmas tree style"): for some shooters and for scope cams it "clutters" the reticle, but it allows for more precise elevation *and* windage holdoffs simultaneously

CD = “center dot” = the crosshairs use a *dot* at the center where the two crosshairs intersect

BDC = bullet drop compensating reticle, meaning that the spacing between the hash lines is uneven and therefore not usable for holdoffs unless shooting the ammo the reticle was calibrated for

Capped Turrets! BUT Clickable = means that though the turrets are capped, when uncapped they are finger adjustable, the numbers are visible from behind the rifle, and the zero can be reset

Hawke scopes: Careful when purchasing them, new or used. Hawke has the annoying habit of coming out with new scope models but fails to either add the designation “Gen. 2” or to give them a new series name. In addition they have the habit of adding a couple of innocuous letters or numbers to the name of the scope – which mean massive changes in the features or the performance. These letters or numbers are easy to miss for both the buyers and commercial and private sellers. To assure you are getting the scope with the features you are thinking you are getting, check that the manufacturer’s model number is the correct one. The Scope Specs Table notes the numbers for most scope models for that very reason.

Prices

In US dollars

Price Low = lowest *street prices* in US dollars I found in 2019 – and updated according to the list below. An additional price is separated by a *comma* ,

Price Mfctr.’s = manufacturer’s price [last price in that field, after the semicolon ;]

Prices and models updated as follows: 2021-06: Hawke | 2021-07: Shepherd | 2022-02: Alpen | Arken | Riton | Bushnell

				Magni. → FoV	→ Eye Box	Exposed Turrets				Holdoff Reticle				Dimensions						
in 2019, some 2020, 2021, 2022	Price: Low; Mfctr's in US \$	War-ranty	Spring-ger-Rated	Magni-fication	FoV = Field of View @ 100y (ft)	Obj. Dia (mm)	Exit Pupil (mm)	IR Y, N	Max. Elev. Adjmt (MOA)	1 Click =	1 T. Turn =	Turrets in:	Reticle in:	FFP Thick O/S Posts? SFP Calibration at ?	Enough Dots, No's, Grid CenterDot	Line thick-ness	Tube Dia-meter	Weight (oz) (g)	Length (inch) (cm)	Misc. + Reviewers' "Comments"
Brand: Series	Part No.																			
SFP Scopes																				
UTG: Accushot No. SCP3-UG6245AOIEW	209; 310	Life		6-24x	15-5	56	8-2.2	Y	??	1/8 moa	15 moa	MOA≠	≠MIL	SFP 10x	D*		30	32.2 910g	17.5" 44c	*Should state glass etched reticle
Nikko: Diamond Long Range No. NDSI62450LRHMD •Ret. HMD	250; ?	Life, O.Own		6-24x	21-5	50		Y	40	1/4 moa		MOA≠	≠MIL	SFP x?	D		30	27.8 788g	15.4" 39c	
Vector: Atlas No. SCOL-04	399; ?	5y, Rec.		5-30x	25-4	56	11-1.9	Y	80	1/8 moa	15 moa	MOA≠	≠MIL	SFP x?	D, N	?	35	35.3 1000g	14.8" 38c	
MTC: Viper Pro Tactical	520; ?	Life ³⁰⁰ R. O.Own		5-30x	24-4	50		Y	42	1/4 moa	10 moa	MOA≠	≠MIL	SFP x?	D	?	30	25.8 732g	16.4" 42c	not customizable
MTC: Viper Pro	570; ?	Life ³⁰⁰ R. O.Own		5-30x	24-4	50		Y	42	1/4 moa	30 moa	MOA≠ Custom	≠MIL	SFP x?	D	?	30	30.7 869g	16.4" 42c	Customizbl. Turrets Magnifier Cap
Bushnell: Engage No. REN62450DG	450; 350, 540	Life, NoRec.		6-24x	18-4	50	?	N 0	50	1/8 moa	8 moa	MIL≠	≠MOA	SFP x?	D	.05 ^{mi} .18 ^{mo}	30	23.7 672g	14.2" 36c	
Hawke: Sidewinder 30 SF No. 17220 Discontinued	439; 600	Life, R. O.Own	Yes!	6-24x	15-4	56	9-2.0	Y	62	1/4 moa	15 moa	MOA≠	≠MIL	SFP 20x	D	?	30	29.8 844g	15.9" 40c	

				Magni. → FoV		→ Eye Box			Exposed Turrets				Holdoff Reticle				Dimensions				
in 2019, some 2020, 2021, 2022	Price: Low; Mfctr.'s in US \$	War-ranty	Springer-Rated	Magni-fication	FoV = Field of View @ 100y (ft)	Obj. ∅ Dia (mm)	Exit Pupil (mm)	IR Y, N	Max. Elev. Adjmt (MOA)	1 Click =	1 T. Turn =	Turrets in:	Reticle in:	FFP Thick O/S Posts? — SFP Calibration at ?	Enough Dots, No's, CD CenterDot	Line thick-ness	Tube Dia-meter	Weight (oz) (g)	Length (inch) (cm)	Misc. + Reviewers' "Comments"	
Brand: Series Part No.																					
Aztec: Emerald SFP	440; —	Life		5.5-25x	19-4	50	?	N O	c. 40?	¼ moa	15 moa	MOA =	=MOA	SFP 18x✓	D, N	?	30	25.4 720	14.4 37c		
Optisan: EVX Gen. 2: 5-20x50i No. 37526	430; 440	Life		5-20x	23-6	50	10-2.5	Y	50	0.1m il	4.8 mil	MIL =	=MIL	SFP x?	D, (N)	.05 ^{mi} .18 ^{mo}	30	27.0 765g	14.4" 37c		
Sightron: S-TAC: [SFP] •Ret. MOA No. S-TAC4-20X50MOA	470; 540	Life		4-20x	24-4	50	?	N O	80 (40 wind age)	¼ moa	15 moa	MOA =	=MOA	SFP x?	D	.03 ^{mi} .1 ^{mo}	30	23.8 675g	14.8" 38c	Dialing Turrets (capped w/ N1) Turn Counter	
Hawke: Sidewinder 30 SF No. 17150	479; 639	Life, R. O.Own	Yes	6.5-20x	19-6	44	7-2.2	Y	95	0.1 mil	6 mil	MIL =	= MIL	SFP 20x	D, Grid	?	30	24.0 680g	13.3" 34c	T Turn Counter	
Vector: Paragon Gen. 2 No. SCOL-26	360; ?	Life, NoRec.		5-25x	22.5-5	56	8-2.2	Y	60	0.1 mil	8 mil	MIL =	=MIL	SFP 10x	D, N, Grid		30	23.6 670g	14.4" 37c	Parallax 15y Locking Turrets	
Element: Helix SFP •MIL Ret. PR-1C SFP •MOA Ret. EHR-1C SFP	400; —	Life, NoRec.		6-24x	19-4	50	9-2.0	N O	65	0.1 mi ¼ moa	6 mil 15 moa	MIL =	=MIL	SFP 24x	D, N	?	30	26.0 737g	13.3" 36c	Toolless Re-zero; 0-Stop; Turn Counter	
Hawke: Airmax 30 SF No. 13320 Discontinued	408; 480	Life, R. O.Own	Yes!	6-24x	17-4	50	8-2.0	Y	65	¼ moa	15 moa	MOA ≠	≠ MIL	SFP 10x	D	?	30	26.7 757g	15.6" 40c	"small Eyebow" Locking Turrets	
Hawke: Airmax 30 SF Compact No. 13220	395; 459	Life, R. O.Own	Yes!	6-24x	22-5	50	8-2.1	Y	53	0.1 mil	6 mil	MIL =	=MIL	SFP 10x	D	?	30	23.6 670g	13.0" 33c	Capped Turrets BUT Large for Clicking! T Turn Counter	
Hawke: Frontier SF •Mil Pro Ret. No. 18130	479; 629	Life, R. O.Own	Yes	4-20x	28-6	44	11-2.2	Y	63	0.1 mil	8 mil	MIL =	=MIL	SFP 20x	D, N, Grid	?	1"	20.6 584g	13.2" 34c	3 Screws to rezero; Locking Turrets; 0-Stop	
Hawke: Frontier SF •Ret. Mil Pro No. 18140	529; 699	Life, R. O.Own	Yes!	5-25x	22.5-4.5	50	10-2.0	Y	37	0.1 mil	8 mil	MIL =	=MIL	SFP 20x	D, N, Grid	?	1"	22.2 628g	14.4 36c	3 Screws to rezero; Locking Turrets; 0-Stop	
Hawke: Sidewinder 30 SF •20x Half Mil Ret. No. 17260	499; 659	Life, R. O.Own	Yes	6-24x	21-5	56	9-2.3	Y	70	0.1 mil	6 mil	MIL =	= MIL	SFP 20x	D, Grid	?	30	27.3 775g	14.3" 36c	T Turn Counter	
Discovery: HD/30mm SFP 5-25x50 No. 170103	207; 300	3y		5-25x	24-5	50	10-2.0 capped	Y	68	0.1 mil	6 mil	MIL =	=MIL	SFP 10x	D, N mini Grid	.05 ^{mi} .18 ^{mo}	30	27.8 785g	13.2" 34c	Locking Turrets	
Vector: Continental 30mm Tactical No. SCOL-33T	?; 499	Life, NoRec.		4-24x	31-5	50	9-2.1	Y	67	0.1 mil	8 mil	MIL =	=MIL	SFP 20x	D, N, Grid		30	23.6 670g	14.6" 37c	Parallax 15y Locking Turrets	
Maven: RS.5 Only SHR-MIL Ret.!	1400; 1400	Life	?	4-24x	27.8-4.6	50	8.5-2.1	Y	100	0.1 mil	10 mil	MIL =	=MIL	SFP 24x	•5mi Elev., CD	?	30	25.5 723g	14.4" 37c	0-Stop; Windage capped	
Hawke: Frontier SF •Mil Pro Ret. No. 18130	479; 629	Life, R. O.Own	Yes	4-20x	28-6	44	11-2.2	Y	63	0.1 mil	8 mil	MIL =	=MIL	SFP 20x	D, N, Grid	?	1"	20.6 584g	13.2" 34c	3 Screws to rezero; Locking Turrets; 0-Stop	
Hawke: Frontier 30 SF •Mil Pro Ret. No. 18441	740; 949	Life, R. O.Own	Yes	5-30x	22.5-3.6	56	11-1.9	Y	57	0.1m il	8 mil	MIL =	=MIL	SFP 20x	D, N, Grid	?	30	25.5 724g	15.8" 40c	Parallax 15y 3 screws to rezero; Locking Turrets; 0-Stop	
Hawke: Frontier 30 SF •Mil Pro Ret. No. 18431	699; 899	Life, R. O.Own	Yes	4-24x	28-5	50	12-2.1	Y	73	0.1m il	8 mil	MIL =	=MIL	SFP 20x	D, N, Grid	?	30	23.4 662g	14.5" 37c	Parallax 15y 3 screws to rezero; Locking Turrets; 0-Stop	
Sightron: S6 SFP •MOA-2 No. 66002	No avail. yet	Life	?	5-30x	23-4	56	?	Y	80 ^(60w)	0.1m il	20 moa	MOA =	=MOA	SFP ??x	D	?	34	33.3 944g	16.7" 42c	0-Stop	

				Magni. → FoV	→ Eye Box	Exposed Turrets				Holdoff Reticle				Dimensions						
in 2019, some 2020, 2021, 2022	Price: Low; Mfgt.'s in US \$	War-ranty	Springer-Rated	Magni-fication	FoV = Field of View @ 100y (ft)	Obj. Dia (mm)	Exit Pupil (mm)	IR Y, N	Max. Elev. Adjmt (MOA)	1 Click =	1 T. Turn =	Turrets in:	Reticle in:	FFP Thick O/S Posts? — SFP Calibration at ?	Enough Dots, No's, Grid CenterDot	Line thick-ness	Tube Dia-meter	Weight (oz)	Length (inch) (cm)	Misc. + Reviewers' "Comments"
Brand: Series	Part No.																			
FFP Scopes																				
FFP Scopes – without Thick Outside Posts in the Reticle																				
Monstrum: No. FFP62450-R •G1 Ret. •G2 Ret.	•230 •200	1y		6-24x	???	50	?	Y	?	¼ moa	15 moa	MOA =	=MOA	FFP No Thick Posts	D	?	30	30.0 29.0	16.6" 15.5"	
Sun Optics: FFP Variable No. CS41-62450	400; 557	1y		6-24x	17-4	50	8-2.0	N O	??	0.1m il	6 mil	MIL =	=MIL	FFP No Thick Posts	D	.10 ^{mi} .34 ^{mo}	30	26.0 737g	14.5" 37c	
Vector: Veyron 6-24x44 No. SCFF-23	198; 289	5y	Yes	6-24x	17-4	44	7-1.8	N O	50	0.1 mil	6 mil	MIL =	=MIL	FFP ³ No Thick Posts	D	.025 ^{mi} .08 ^{mo}	30	20.5 580g	11.7" 30c	Locking Turrets
Vector: Marksman 6-24x50 No. SCFF-26 (not the 6-25x50, SCFF-11)	?; 230	5y, Rec.		6-24x	17-5	50	8-2.1	N O	60	0.1 mil	6 mil	MIL =	=MIL	FFP ¹⁶ No Thick Posts	D, N, Grid	?	30	24.7 700g	14.2" 36c	Locking turrets
MTC: King Cobra F1	446; 629; —	Life ³⁰⁰ R. O.Own		6-24x	16-4	50	?	Y	38 (??)	0.1 mil	5 mil	MIL =	=MIL	FFP ¹⁸ No Thick Posts	D		30	26.3 746g	14.4" 37c	Locking Turrets Magnify. Lens Cap
Hawke: Sidewinder 30 SFFF No. 17420 Discontinued	500; 600	Life, R. O.Own	Yes!	6-24x	17-4	56	9-2.0	Y	60	0.1m il	5 mil	MIL =	=MIL	FFP ¹⁰ No Thick Posts	D	?	30	31.1 880g	15.9" 40c	
Hawke: Airmax 30 FFP SF No. 13352	496; 589	Life, R. O.Own	Yes!	6-24x	21-5	50	8-2.1	Y	57	0.1 mil	6 mil	MIL =	=MIL	FFP No Thick Posts	D	?	30	27.0 765g	14.9" 38c	Capped Turrets! BUT Clickable
Hawke: Vantage 30 WA FFP No. 14304	424; 589	Life, R. O.Own	<12 FPE	6-24x	21-5	50	8-2.1	Y	60	0.1il	6 mil	MIL =	=MIL	FFP No Thick Posts	D	?	30	26.6 755g	14.9" 38c	
Discovery: HD: 4-20x50 SFIR No. 170105	200; 300	3y		4-20x	24-5	50	?	Y	60	0.1 mil	6 mil	MIL =	=MIL	FFP ²⁴ No Thick Posts	D, N, mini Grid	.05 ^{mi} .17 ^{mo}	30	28.1 795g	13.2" 34c	Locking Turrets
Vector: Taurus No. SCFF-14	?; 449	Life, NoRec.		5-30x	20-3	56	11-1.8	Y	40	0.1m il	6 mil	MIL =	=MIL	FFP ² No Thick Posts	D, N	?	30	28.7 813g	15.6" 40c	Parallax 17y (20y stated)
Konus (Italy): Pro F30 No. 7297	590; ?	Life		6-24x	16-4	52	8-2.2	Y	60	0.1m il	5 mil	MIL =	=MIL	FFP ¹² No Thick Posts	D	.04 ^{mi} OR? .05 .14 ^{mo}	30	28.6 810g	16.4" 42c	Cant Bubble Large Parallax T.
Discovery: HD: 5-25x50 SFIR DLTW FFP No. 170110	?; 315	3y		5-25x	24-5	50		Y	60	0.1m il	6 mil	MIL =	=MIL	FFP ⁴ No Thick Posts	D, N	.05 ^{mi} .17 ^{mo}	30	27.8 788g	13.5" 34c	Locking Turrets
Discovery: HD/34mm: 5-30x56 SFIR No. 170114	?; 392	3y		5-30x	23-3	56	11-1.9	Y	70 (or 50?)	0.1m il	6 mil	MIL =	=MIL	FFP ³ No Thick Posts	D, N, Grid	?	34	31.8 903g	15.6" 40c	Parallax is 10y. Locking Turrets
Hawke: Sidewinder 30 FFP •FFP Half Mil Ret. No. 17460 •FFP MOA Ret. No. 17461	629; 799. 670; 799	Life, R. O.Own	Yes	6-24x	21-5	56	9-2.3	Y	70	0.1mi ¼mo	6 mil 15moa	MIL = =MOA	=MIL	FFP No Thick Posts	D, Grid	?	30	27.3 775g	14.3" 36c	T Turn Counter
Vector: Taurus No. SCFF-17	?; 430	Life, NoRec.		4-24x	27-4	50	12-2.1	Y	50	0.1m il	6 mil	MIL =	=MIL	FFP ²³ No Thick Posts	D, N	.04 ^{mi} .14 ^{mo}	30	27.1 770g	15.0" 38c	Parallax is 10y. Locking turrets
Discovery: HD/34mm: 4-24x50 SFIR No. 170109	330; 375	3y		4-24x	27-5	50	12-2.1 caliber	Y	85	0.1m il	6 mil	MIL =	=MIL	FFP ¹ No Thick Posts	D, N, Grid	.05 ^{mi} .17 ^{mo}	34	23.7 776g	14.7" 37c	Parallax is 10y. Locking Turrets
Hawke: Frontier 30 FFP •Mil Pro 20xRet. No. 18530	799; 999	Life, R. O.Own	Yes	4-20x	28-6	50	12-2.5	Y	77	0.1 mil	8 mil	MIL =	=MIL	FFP ³⁶ No Thick Posts	D, N, Grid	?	30	22.2 630g	13.2" 34c	Parallax 15y 3 Screws to rezero; Locking Turrets; 0-Stop
Hawke: Frontier 30 FFP •Mil Pro 25xRet. No. 18540	849; 1049	Life, R. O.Own	Yes	5-25x	22-5-4-5	56	11-2.2	Y	65	0.1m il	8 mil	MIL =	=MIL	FFP ¹⁴ No Thick Posts	D, N, Grid	?	30	24.8 698g	13.2" 37c	Parallax 15y 3 Screws to rezero; Locking Turrets; 0-Stop
FFP Scopes – with Thick Outside Posts in the Reticle																				
Vector: Tourex No. SCFF-19	?; 280	5y, Rec.		6-24x	18-5	50	8-2.1	Y	50	¼ moa	15 moa	MOA =	=MOA	FFP ¹⁷ Thick O/S Posts	D, N, but 4-12, 20, 28, 36	?	30	26.3 745g	14.3" 37c	Zero stop turrets

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Brand: Series <small>Part No.</small>																				
Monstrum: No. G3F62450 •G3 Ret. •GH Ret. No. FFPS62450-H	•250 •200	1y		6-24x	18-5	50	?	Y	80	¼ moa	15 moa	MOA =	=MOA	FFP Thick O/S Posts	D	?	30	30.0 850g	15.8" 16.6"	Parallax is 10y
Aztec: Emerald FFP	540; —	Life	Yes!	5.5-25x	19-4	50	?	Y	c. 40?	¼ moa	15 moa	MOA =	=MOA	FFP ¹⁹ Thick O/S Posts	D, N mini Grid	?	30	25.4 720g	14.4 37c	"Low DoF"
ACME Machine No. 08-625 •TR-MIL Ret. •TR-MOA Ret. No. 08-624	?; 300			6-24x	17-4	50	8- 2.1	Y	60	0.1mi ¼mo	??mil 12moa	MIL = MOA =	=MIL =MOA	FFP ²⁰ Thick O/S Posts	D		30	28.5 808g		Parallax is 10y. T. Turn Counter
Discovery: VT-3: 6-24x50 SFAI FFP No. 170602	?; 290	3y		6-24x	19-5	50	?	N O	50	⅛ moa	7.5 moa	MOA =	=MOA	FFP Thick O/S Posts	D, N, Person Ranging	?	30	26.7 758g	14.7" 37c	Angle Indicator Locking Turrets
Discovery: VT-T: 6-24x50 SFVF FFP No. 170503	207; 350	3y		6-24x	19-5	50	?	N O	60	0.1 mil	6 mil	MIL =	=MIL	FFP Thick O/S Posts	D, N	?	30	26.1 740g	14.7" 37c	w/Phone Adaptor Locking Turrets
Discovery: HI: 6-24x50 SFIR FFP No. ???	?; 259	Life✓	?	6-24x	???- ?	50	?	Y	??	0.1 mil	6 mil	MIL =	=MIL	FFPSemi Thick Posts	D, N, Grid	?	30	23.8? 675g? Really?	14.1" 36c	Mech. Range Finder, Angle Indicator 4 Screws to rezero
Sightron: S-TAC: [FFP] •Ret MIL No. S-TAC4-20X50FFPZSFRMH	660; 800	Life		4-20x	22-4	50	?	Y	80 (40 wind age)	0.1 mil	5 mil	MIL =	=MIL	FFP Thick O/S Posts	D, N	.035 ^{mi} .12 ^{mo}	30	25.6 725g	15.0" 38c	0-Stop T Turn Counter
Hi-Lux (US): PentaLux TAC-VF 4-20x50 FFP G2	539; 575	Life, Rec.	No	4-20x	28-6	50	12- 2.5	Y	80	0.1 mil	12 mil	MIL =	=MIL	FFP ³² Thick O/S Posts	D, N	?	30	27.9 791g	14.7" 37c	Locking Turrets Throw Lever
Swampfox (US): Warhawk •Sharpsh. Grid Ret. MIL No. TWK42050-3L •Sharpsh. Grid Ret. MOA No. TWK42050-3M	??; 659	Life (50000 rounds)		4-20x	32-7	50	13- 2.4	Y	90	0.1mi ¼mo	10 mi 25mo	MIL = MOA =	=MIL =MOA	FFP ³⁴ Semi Thick Posts	D, N, Grid	?	34	32.8 930g	15.0 38c	Locking Turrets
Athlon: Helos BTR Gen. 2 •APRS6 MIL Ret. No. 214109 •APLR6 MOA Ret. No. 214108	500; 712	Life, NoRec.		4-20x	28-6	50	?	Y	100	0.1mi ¼mo	10 mil 25mo	MIL = MOA =	=MIL =MOA	FFP Thick O/S Posts	D, N, Grid	.05 ^{mi} .17 ^{mo} .05 ^{mi} .17 ^{mo}	30	27.6 782g	13.3" 34c	0-Stop T Turn Counter
Nikko: Diamond FFP 30 •PRR Ret. No. NSFFP62450PRR •Skeleton HMD Reticle No. NSFFP62450HMD	300; ?	Life, O.Own		6-24x	19-5	50	?	Y	50	0.1 mil	6 mil	MIL =	=MIL	FFP ²⁷ O/S Posts •Thick •Not Thick	D, N D, —	.05 ^{mi} .17 ^{mo}	30	24.0 680g	14.2" 36c	Locking Turrets
Nikko: Diamond FFP 34 •PRR Ret. No. NSFFP3441644PRR •Skeleton HMD Ret. No. NSFFP3462450PRR	430; ?	Life, O.Own		6-24x	21-5	50	?	Y	80	0.1 mil	6 mil	MIL =	=MIL	FFP ²⁸ O/S Posts •Thick •Not Thick	D, N D, —	.05 ^{mi} .17 ^{mo}	34	26.5 750g	14.2" 36c	Locking Turrets
Optisan: EVX, Gen. 2: 6-24x50 F1 •w/ IR No. 37583 •w/o IR No. 37534	?; 560	Life		6-24x	19-6	50	8- 2.1	Ei th er	50	0.1 mil	4.8 mil	MIL =	=MIL	FFP ²¹ Semi Thick Posts	D, (N)	?	30	26.5 751g	14.8" 38c	Locking Turrets
Riton (US): 3 Conquer	500; 587	Life, NoRec		6-24x	17-4	50	8- 2.1	Y	70	0.1 mil	6 mil	MIL =	=MIL	FFP Thick O/S Posts	D, N, Grid	.045 ^{mi} .15 ^{mo}	30	27.1 768g	14.1" 36c	0-Stop
Swampfox (US): Patriot •Sharpsh. Grid Ret. MIL No. PAT62450-L •Sharpsh. Grid Ret. MOA No. PAT62450-M	300; 429	Life (50000 rounds)		6-24x	18-4	50	8- 2.1	N O	65	0.1mi ¼mo	6 mi 15mo	MIL = MOA =	=MIL =MOA	FFP Thick O/S Posts	D, N, Grid	?	30	24.0 680g	14.5 37c	
Blackhound (US): Genesis 6-24x50 FFP •MIL •MOA	?; 400	Life, Anyb.	?	6-24x	16-4	50	?	Y	70	0.1mi ¼mo	5 mil 15mo	MIL = MOA =	=MIL =MOA	FFP ⁹ Thick O/S Posts	D, N	?	30	27.5 780g	14.1" 36c	0-Stop T Turn Counter
Athlon: Argos BTR Gen.1 •MIL Ret. No. 214061 Discontinued •MOA Ret. No. 214060	297; 445	Life, NoRec.		6-24x	17-4	50	8- 2.1	Y (a user reported 70)	60	0.1mi ¼mo	5 mil 12mo	MIL = MOA =	=MIL =MOA	FFP ¹³ Thick O/S Posts	D, N, Grid	.02 ^{mi} .07 ^{mo} .04 ^{mi} .14 ^{mo}	30	29.6 835g	14.1" 36c	T Turn Counter "Tracks, Wide DoF, small Eye Box"

				Magni. → FoV	→ Eye Box			Exposed Turrets				Holdoff Reticle				Dimensions				
in 2019, some 2020, 2021, 2022	Price: Low; Mfctr.'s in US \$	War-ranty	Sprin-ger-Rated	Magni-fication	FoV = Field of View @ 100y (ft)	Obj. Dia (mm)	Exit Pupil (mm)	IR Y, N	Max. Elev. Adjmt (MOA)	1 Click =	1 T. Turn =	Turrets in:	Reticle in:	FFP Thick O/S Posts? — SFP Calibration at ?	Enough Dots, No's, CD, Grid CenterDot	Line thick-ness	Tube Dia-meter	Weight (oz) (g)	Length (inch) (cm)	Misc. + Reviewers' "Comments"
Brand: Series Part No.																				
Athlon: Argos BTR Gen 2 • MIL Ret. No. 214063	380; 450	Life, NoRec.		6-24x	17-4	50	8-2.1	Y	60 (a user reported 70)	0.1mi	6 mil	MIL =	=MIL	FFP ³¹ Thick O/S Posts	D, N, Grid	.02 ^{mi} .07 ^{mo} .04 ^{mi} .14 ^{mo}	30	30.3 859g	14.1" 36c	0-Stop T Turn Counter
• MOA Ret. No. 214062										1/4mo	15mo	MOA =	=MOA							
Vortex: Diamondback Tactical • MIL Ret. No. DBK-10029 • MOA Ret. No. DBK-10028	400, 300; 500	Life		6-24x	18-4	50	8-2.1 calculated	N O	65	0.1mi	6 mil	MIL =	=MIL	FFP ⁸ Thick O/S Posts	D, N, Grid	.03 ^{mi} .12 ^{mo}	30	24.6 697g	14.3" 36c	"Tracks" "small Eyebow"
Discovery: ED: 6-24x50 SFIR No. 171104	335; 383	Life (for ED)	?	6-24x	21-5	50	?	Y	70	0.1 mil	5 mil	MIL =	=MIL	FFP ⁷ Thick O/S Posts	D, N, Grid	?	30	25.8 730g	14.1" 36c	Locking Turrets 4 Screws to re-zero
Element: Helix FFP • MIL Ret. APR-2D MRAD • MOA Ret. APR-2D MOA	480; —	Life, NoRec.		6-24x	18-5	50	9-2.2	N O	65	0.1 mi	6 mil	MIL =	=MIL	FFP ³⁰ Thick O/S Posts	D, N, Grid	?	30	26.0 737g	14.3" 36c	Toolless Re-zero; 0-Stop; Turn Counter
Bushnell: Match Pro • w/ IR No. MP6245BF8 • w/o IR No. MP6245BF2	—; 500, 450	Life NoRec.		6-24x	18-4	50	?	Ei th er	65	0.1 mil	10 mil	MIL =	=MIL	FFP ⁴⁴ Thick O/S Posts	D, N, Grid	.05 ^{mi} .17 ^{mo}	30	29.8 845g	14.0" 36c	Locking Turrets; Toolless Re-zero
Athlon: Helos BTR • MIL Ret. No. 214107 Gen. 1 = Discontinued • MOA Ret. No. 214106	459, 570; 712	Life, NoRec.		6-24x	17-5	50	8-2.1	Y	60	0.1mi	6 mil	MIL =	=MIL	FFP ⁶ Thick O/S Posts	D, N, Grid	.02 ^{mi} .07 ^{mo} .04 ^{mi} .14 ^{mo}	30	29.7 842g	14.0" 36c	T Turn Counter Locking Turrets
Athlon: Midas TAC • MILAPRS2 Ret. No. 213075 • MILAPRS3 Ret. No. 213077 • MOA APLR4 Ret. No. 213076	•630 756 •670 837 •670 837	Life, NoRec.		6-24x	18-5	50	11-1.8	Y	85 (50 Wind age)	0.1mi	10 mil	MIL =	=MIL	FFP ⁵ Thick O/S Posts	D, N, Grid D, N, Grid	.03 ^{mi} .10 ^{mo} .036 ^{mi} .12 ^{mo}	30	26.3 746g	14.6" 37c	0-Stop T Turn Counter Windage Capped
Alpen: Apex No. 4015	720; 980	Life, 60d		4.5-27x	22-4	50	10-1.9	Y	80	1/4 moa	25 moa	MOA =	=MOA	FFP Thick O/S Posts	D	?	30	heavy ???	16.9" 43c	
Shepherd (US): BRS • BRS-MIL Ret. • BRS-MOA Ret.	749; 849	Life, 00wn		5-25x	22 ⁵ -4 ⁵	56	?	Y	60	0.05 mil	? mil	MIL =	=MIL	FFP ³⁵ Thick O/S Posts	D, N, Grid	? ? .04 ^{mi} .13 ^{mo}	34	37.9 1075g	15.4 39c	T Turn Counter Locking Turrets
Swampfox (US): Warhawk • Sharpsh. Grid Ret. MIL • Sharpsh. Grid Ret. MOA No. TWK52556-3L No. TWK52556-3M	569; 689	Life (50000 rounds)		5-25x	25 ⁵ -5	56	11-2.2	Y	90	0.1mi	10 mi	MIL =	=MIL	FFP ³⁴ Semi Thick Posts	D, N, Grid	?	34	36.8 1043g	15.4 39c	Parallax 15y Locking Turrets
Swampfox (US): Ken-tucky Long • Sharpsh. Grid Ret. MIL • Sharpsh. Grid Ret. MOA No. KTK53056-4L No. KTK53056-4M	467; 599	Life (50000 rounds)		5-30x	20-4	56	9-1.7	Y	80	0.1mi	6 mi	MIL =	=MIL	FFP ²² Semi Thick Posts	D, N, Grid	?	30	31.8 902g	15.5 39c	Parallax 15y Locking Turrets
Athlon: Helos BTR Gen. 2 • MIL Ret. No. 214114 • MOA Ret. No. 214113	600; 750	Life, NoRec.		6-24x	20-5	56	?	Y	100	0.1mi	10 mil	MIL =	=MIL	FFP ⁶ Thick O/S Posts	D, N, Grid	.03 ^{mi} .10 ^{mo} .04 ^{mi} .12 ^{mo}	34	34.5 978g	14.3" 37c	0-Stop T Turn Counter
Zero Tech (US): Vengeance	?; 800	Life, NoRec.		5-25x	21-6	56	9-1.9	Y	96 69 Win-dage	0.1 mil	10 mil	MIL =	=MIL	FFP Thick O/S Posts	D, N, Grid	.04 ^{5mi} .15 ^{mo}	34	39.0 1105g	15.1" 38c	Parallax 15y 3 screws; Locking Turrets; 0-Stop
Arken (US): EPL4 • MIL Ret. No. EPL4-6241VHR • MOA Ret. No. EPL4-6240VHR	400; 440	Life		6-24x	18 ⁶ -4 ⁷	50	?	Y	68 40 Win-dage	0.1mi	8 mi	MIL =	=MIL	FFP ⁴² Thick O/S Posts	D, N, CD	.03 ^{mi} .10 ^{mo}	30	23.7 672g	13.8" 35c	0-Stop, 3 screws to rezero, T Turn Counter

				Magni. → FoV	→ Eye Box			Exposed Turrets				Holdoff Reticle				Dimensions				
in 2019, some 2020, 2021, 2022	Price: Low; Mfg's in US \$	Warranty	Springer-Rated	Magnification	FoV = Field of View @ 100y (ft)	Obj. Dia (mm)	Exit Pupil (mm)	IR Y, N	Max. Elev. Adj. (MOA)	1 Click =	1 T. Turn =	Turrets in:	Reticle in:	FFP Thick O/S Posts? — SFP Calibration at ?	Enough Dots, No's, Grid CenterDot?	Line thickness	Tube Diameter	Weight (oz) (g)	Length (inch) (cm)	Misc. + Reviewers' "Comments"
Swampfox (US): Kentucky Long • Sharpsh. Grid Ret. MIL • Sharpsh. Grid Ret. MOA <small>No. KTK42450-4M</small>	459; 569	Life (50000 rounds)		4-24x	31-5	50	11-2.0	Y	90	0.1mi	6 mil	MIL =	=MIL	FFP ³³ Semi Thick Posts	D, N, Grid	?	30	28.2 800g	15.1 38c	Locking Turrets
Falcon (UK): S30 Gen. 1 (–2020) <small>No. S3001</small>	377, 423; –	10y, 0.Own		5-30x	24-5	56	11-1.9 <small>chilled</small>	N	57	0.1mil	10 mil	MIL =	=MIL	FFP Thick O/S Posts	D, N, Grid	.04 ^{mi} .14 ^{mo}	30	32.5 920g	15.8" 40c	T Turn Counter
Falcon (UK): S30 Gen. 2 (2020–)	?; –	10y, 0.Own		5-30x	24-5	56	11-1.9 <small>chilled</small>	N	90	0.1mil	12 mil	MIL =	=MIL	FFP Thick O/S Posts	D, N, Grid	?	34	36.0 1020g	14.6" 37c	No T Turn Counter, but 12mil/turn
Hi-Lux (US): Phenom 5-30x56 FFP	507; 599	Life, Rec.	No	5-30x	23-4	56	10-1.2	Y	90	0.1mil	12 mil	MIL =	=MIL	FFP Thick O/S Posts	D, N, Grid	.05 ^{mi} .17 ^{mo}	34	32.0 907g	14.7" 37c	Locking Turrets 12mil/turn
Hawke: Frontier 34 FFP • MIL Ret. <small>No. 18640</small> • MOA Ret. <small>No. 18641</small>	1260; 1400	Life, R. 0.Own	Yes	5-30x	22 ⁵ -4	56	11-1.9	Y	100 <small>53 Win-dage</small>	0.1mi 1/4mo	8 mil	MIL =	=MIL	FFP Semi Thick Posts	D, N, Grid	.03 ^{mi} .11 ^{mo}	34	29.3 830g	15.4" 39c	Parallax 15y 3 screws; Locking Turrets; Zero Stop
Vortex: Strike Eagle • MIL Ret. <small>No. SE-52504</small> • MOA Ret. <small>No. SE-52503</small> <small>Some Fails! https://www.youtube.com/watch?v=uo6lY4xpQs</small>	700; 800	Life		5-25x	24-5	56	? <small>no off</small>	Y	110 <small>78 Win-dage</small>	0.1mi 1/4mo	10 mi 25 mo	MIL =	=MIL	FFP Thick O/S Posts	D, N, Grid	.03 ^{mi} .11 ^{mo}	34	31.8 902g	15.5" 39c	Parallax 15y 0-Stop → <small>then only 47moa elev. adj.</small> Locking Turrets
Element: Titan • MIL Ret. APR-2D • MOA Ret. APR-2D • MOA Ret. EHR-1C • MIL Ret. APR-1C	800; –	Life, NoRec.		5-25x	24-5	56	11-2.1	Y	90 <small>50 Win-dage</small>	0.1mi 1/4mo	10 mi 25 mo	MIL =	=MIL	FFP ²⁰ Thick O/S Posts	D, N, Grid, CD D, (N), CD.	?	34	39.0 1105g	15.2" 39c	Parallax 15y 0-Stop → <small>then only 47moa elev. adj.</small> Toolless Re-zero; T Turn Counter
Riton: 5 Conquer (or X5) • PSR MIL Ret. • BAF MOA Ret.	550, 600; 824	Life		5-25x	22 ⁵ -4 ⁵	50	10-2.2	Y	70	0.1mi 1/4mo	10 mi 25 mo	MIL =	=MIL	FFP ³⁰ Thick O/S Posts	D, N, Grid, CD	.035 ^{mi} .12 ^{mo}	34	34.0 963g	15.4" 39c	0-Stop; 3 Screws to rezero
Riton: 5 Conquer (or X5) • TPSR MIL Ret. • BAF MOA Ret.	700; 1003, 1400	Life		4-28x	30-4 ³	56	8-2.0	Y	95	0.1mi 1/4mo	10 mi 25 mo	MIL =	=MIL	FFP ⁴⁰ Thick O/S Posts	D, N, Grid, CD	.035 ^{mi} .12 ^{mo} <small>?mi ?mo</small>	34	36.8 1043g	14.9" 38c	Parallax c. 13y 0-Stop; 3 Screws to rezero
Vector: Continental 34mm • No. SCFF-29 • No. SCFF-40 (more holds)	680; 850	Life, NoRec.		4-24x	31-5	56	8-2.3	Y	113	0.1mil	10 mil	MIL =	=MIL	FFP ²⁵ Thick O/S Posts	D, N, Grid	?	34	27.5 780g	14.3" 36c	0-Stop → <small>then only 68moa elev. adj.</small> Locking Turrets mech. T-Counter
Vector: Continental 34mm <small>No. SCFF-30</small>	710; 900	Life, NoRec.		5-30x	24 ⁷ -4	56	8-1.8	Y	86	0.1mil	10 mil	MIL =	=MIL	FFP ²⁶ Thick O/S Posts	D, N, Grid	.04 ^{mi} .14 ^{mo}	34	28.6 810g	15.4" 39c	0-Stop → <small>then only 68moa elev. adj.</small> Locking Turrets mech. T-Counter
Bushnell: Match Pro ED	–; 700	Life NoRec.		5-30x	24 ⁵ -4	56	? <small>no off</small>	Y	103	0.1mil	10 mil	MIL =	=MIL	FFP ³⁴ Thick O/S Posts	D, N, Grid, CD	.04 ^{mi} .14 ^{mo}	34	32.0 907g	15.4" 39c	0-Stop; Locking Turrets; Toolless Re-zero; mech. T-Counter
Maven: RS.4 • CFR-MIL Ret. • SHR-MIL Ret. • MOA-2 Ret.	1800; 1800	Life	?	5-30x	23 ³ -4	56	9-1.9	Y	120	0.1mi 0.1mi 1/4mo	10 mi 10 mi 25 mo	MIL =	=MIL	FFP Thick O/S Posts	All: CD • D, N, Grid, • 5mi Elv., N • D, N, Grid	?	34	35.4 1004g	12.8" 33c	Parallax is <11y. Zero Stop; Re-zero req. Allen wrench; T Turn Counter
Riton: 7 Conquer (or X7) PSR MIL Ret.	1310; 1683, 2300	Life		4-32x	27-3 ⁴	56	7-1.6	Y	105	0.1mil	10 mil	MIL =	=MIL	FFP ⁴¹ Thick O/S Posts	D, N, Grid, CD	?	34	37.0 1049g	15.0" 38c	Parallax is <11y. 0-Stop; 3 Screws to rezero

				Magni. → FoV		→ Eye Box		Exposed Turrets				Holdoff Reticle				Dimensions				
in 2019, some 2020, 2021, 2022	Price: Low; Mfctr.'s in US \$	War-ranty	Springer-Rated	Magni-fication	FoV =Field of View @ 100y (ft)	Obj. Dia (mm)	Exit Pupil (mm)	IR Y, N	Max. Elev. Adjmt (MOA)	1 Click =	1 T. Turn =	Turrets in:	Reticle in:	FFP Thick O/S Posts? — SFP Calibration at ?	Enough Dots, No's, Grid CenterDot	Line thick-ness	Tube Dia-meter	Weight (oz) (g)	Length (inch) (cm)	Misc. + Reviewers' "Comments"
Nightforce: NX8 •MOAR F1 Ret. •MIL-C F1 Ret. •MIL-XT Ret.	2150; 2150	Life, Anyb., Register		4-32x	26 ¹ -4 ⁶	50	7-1.6	Y	90 70° Win-dage	1/4mo	25 mo	MOA =	=MOA	FFP ⁴⁵ Thick O/S Posts	•D, N •D, N, CD • and Grid	?? ^{mi} ?? ^{mo} .04 ^{mi} .14 ^{mo} ?? ^{mi} ?? ^{mo}	30	28.6 811g	13.4"	0-Stop; 3 Screws to rezero; Locking Turrets
Falcon (UK): S18i FFP → For comparison only ²⁰¹⁹	343, 380; —	10y, 0.Own	Yes	3-18x	39-7 @10m = 1.4m	50	16-2 8 chard	Y	90 Mine travels 105	0.1m il	10 mil	MIL =	=MIL	FFP ¹¹ Thick O/S Posts	D, N	.04 ^{mi} .14 ^{mo}	30	31.0 880g	14.6"	T Turn Counter
in 2019, some 2020, 2021	Price: Low ; Mfctr.'s US \$	War-ranty	Springer-Rated	Magni-fication	FoV =Fi-eld of View @ 100y (ft)	Obj. Dia (mm)	Exit Pupil (mm)	IR Y, N	Max. Elev. Adjmt (MOA)	1 Click =	1 Turn =	Turrets in:	Reticle in:	FFP Thick O/S Posts? — SFP Calibrated at ?	Enough Dots, No's, Grid, CenterDot	Line Thick-ness	Tube Dia-meter	Weight (oz) (g)	Length (inch) (cm)	Misc. + Reviewers' "Comments"
				Magni. → FoV	→ Eye Box	Exposed Turrets				Holdoff Reticle				Dimensions						

Notes About Different Scopes – N1, N2, N3, etc.:

N1: Sightron ExacTrack turret adjustment system: Though the turrets of the indicated scope are capped, they are made for dialing, because they use the same ExacTrack turret adjustment system as the uncapped scopes of the following series (as of the 2012 and 2022 catalog): S-TAC | SVIII | S6 | SV | SIII | SII | SII Big Sky
→ Dialing Turrets (capped w/ ^{N1})

Reticles: Footnotes: Links for Views or Videos of FFP Reticles at Different Magnifications

Note on more detailed reticle diagrams:

- Athlon: Each scope on their homepage includes detailed diagrams: <https://athlonoptics.com>
- Discovery: many scopes reticles are listed here: <https://discoveryoptics.co.uk/reticles/>

¹ Discovery: HD/34mm: 4-24x50 FFP: Reticle at all magnifications: @ 4:56min:
<https://www.youtube.com/watch?v=DerSb0Y-d34>

² Vector: Taurus: 5-30x56 FFP: Reticle at all magnifications: @ 10:04min:
<https://www.youtube.com/watch?v=xV6m6OUR33c>
Reticle at all magnifications, in front of a favorable background:
<https://www.youtube.com/watch?v=pQ82hBoSwdw>

³ Discovery: HD/34mm: 5-30x56 FFP:
Reticle at all magnifications, in front of a non-favorable background: @ 1:51min:
<https://www.youtube.com/watch?v=b4EF9OMRv2M>
Reticle at all magnifications: @ 29.55min:
<https://www.youtube.com/watch?v=PQSVqejjaEKE>
Illuminated Reticle at all magnifications, but no *non-illuminated* view: @ 1:23min:
<https://www.youtube.com/watch?v=31y22fzGb1M>

⁴ Discovery: HD: 5-25x50 FFP: *Illuminated* Reticle at all magnifications, but no *non-illuminated* view: @ 4:29
<https://www.youtube.com/watch?v=SJZNGszt0E4>
non-illuminated view: @ 2:35min: <https://www.youtube.com/watch?v=zR9mUevdVX0>

⁵ Athlon: Midas TAC: Reticle at min. and max. magnification:
• MIL: APRS2 Reticle: <https://athlonoptics.com/product/midas-tac-6-24x50-aprs2-ffp-mil-scope/>
• MIL Grid: APRS3 Reticle: <https://athlonoptics.com/product/midas-tac-6-24x50-aprs3-ffp-mil-scope/>
• MOA: APLR4 Reticle: <https://athlonoptics.com/product/midas-tac-6-24x50-aplr4-ffp-moa-scope/>

⁶ Athlon: Helos BTR: Reticle at min. and max. magnification:
• APMR MIL Grid: <https://athlonoptics.com/product/rifle-scopes-helos-btr/>
• APLR2 MOA: <https://athlonoptics.com/product/rifle-scopes-helos-btr-3/>

- ⁷ Discovery: ED: 6-24x50 FFP: Reticle at all magnifications: @ 6.44min:
<https://www.youtube.com/watch?v=1Ph66qud50M>
- ⁸ Vortex: Diamondback: 6-24x50 FFP: Reticle at all magnifications: @ 6.55min:
<https://www.youtube.com/watch?v=weHwC3amwfE>
- ⁹ Blackhound: Genesis: 6-24x50 FFP: Reticle at min. and max. magnification:
• Alpha MIL reticle: Owner's Manual: <https://www.blackhoundoptics.com/product/genesis-6-24x50-ffp-mil/>
• Ascent MOA reticle: <https://www.blackhoundoptics.com/product/genesis-6-24x50-ffp-moa/>
- ¹⁰ Hawke: Sidewinder: 30 SF FFP: 6-24x56 [No. 17420]: Reticle at min. and max. magnification:
<https://us.hawkeoptics.com/sidewinder-30-sf-ffp-riflescopes.html>
- ¹¹ Falcon: S18i 3-18x50 FFP: Reticle at all magnifications: @ 2:06min:
<https://www.youtube.com/watch?v=RGmnOFp2fUU>
- ¹² Falcon: F30 6-24x50 FFP: Reticle at 6x magnification (24x at the mfctr's webpage): @ 5:33min:
<https://www.youtube.com/watch?v=swZJkEM76hw>
- ¹³ Athlon: Argos BTR Gen. 1: 6-24x50 FFP: Reticle at min. and max. magnifications:
• APMR MIL reticle: <https://athlonoptics.com/product/rifle-scope-argos-6-24x50/>
• APLR2 MOA reticle: <https://athlonoptics.com/product/rifle-scopes-argos-6-24x50-atmr-ffp-ir-moa/>
- ¹⁴ Hawke: Frontier 30 FFP: 5-25x56, Mil Pro 25x Reticle [No. 18540]: Reticle at 25x magnification: @ 5:25min
<https://www.youtube.com/watch?v=Gcud4IGjOA>
Cf. also footnote ³⁶ for the same reticle in an FFP scope, and both reticles have to cover a 5-fold magnification range and thus will be similar at the bottom end of the magnification and the top end.
- ¹⁵ Vector: Counterpunch: 6-25x56 FFP: Reticle at all magnifications:
<https://www.youtube.com/watch?v=E9qIPzpxvTQ>
- ¹⁶ Vector: Marksman: 6-24x50 FFP: Reticle at all magnifications: @ 6:33min:
<https://www.youtube.com/watch?v=BnLJLvXVSol>
and @ 4.47min: <https://www.youtube.com/watch?v=nepYkyfjpng>
- ¹⁷ Vector: Tourex: 6-24x50 FFP: Reticle at various magnifications: @ 2.04min:
https://www.youtube.com/watch?v=zD-HN8uU_fo
- ¹⁸ MTC: King Cobra F1: 6-24x50 FFP: Reticle at all magnifications: @ 1:03min:
<https://www.youtube.com/watch?v=4RjMgVRqTM4>
- ¹⁹ Aztec: Emerald: 5.5-25x50 FFP: Reticle at all magnifications: @ 4.21min:
<https://www.youtube.com/watch?v=8GwntsJAUtU>
- ²⁰ ACME Machine: 6-24x50 FFP: Reticle at 6x, 14x, and 24x magnifications: @ 1:55min:
<https://www.youtube.com/watch?v=LCI2SM7G2t0>
Reticle at 6x and 24x, MOA:
<https://www.acmemachine.com/optics-sights/6-24x50mm-first-focal-plane-tactical-rifle-scope-tr-mil-reticle/?variant=48625453254>
- ²¹ Optisan: EVX: 6-24x50 FFP F1: Reticle at 6x, 15x, and 24x magnifications: @ 12:33min:
<https://www.youtube.com/watch?v=RuXmjOLxwNw>
- ²² Swampfox: Kentucky Long: 5-30x56 FFP: MOA Reticle: Reticle at all magnification: @ 3:16min:
<https://www.youtube.com/watch?v=riYsEFSXYyw>
- ²³ Vector: Taurus: 4-24x50 FFP: Reticle at min. and max. magnification: @ 0:37min (play at slowest playback speed, the min. magnification will be shown only for a *split second* – but shows how thin the outside post really are, they are not really “medium”:
<https://www.youtube.com/watch?v=rZRVuR5-398>
- ²⁴ Discovery: HD: 4-20x50 SFIR FFP: Reticle at all magnifications: @ 2:42min:
https://www.youtube.com/watch?v=C1qBt7yg_ek
- ²⁵ Vector: Continental 34mm: 4-24x56 FFP: Reticle at all magnifications: @ 1:27min:
<https://www.youtube.com/watch?v=ceLSb2gkmbk>
<https://www.vectoroptics.com/data/uploads/2020/06/22/1592831142.jpg>
- ²⁶ Vector: Continental 34mm: 5-30x56 FFP: Reticle at all magnifications: @ 2:23min:
<https://www.youtube.com/watch?v=S97yza3Fph4>
Reticle at min. and max. magnification:
<https://www.vectoroptics.com/data/uploads/2020/06/22/1592831200.jpg>
- ²⁷ Nikko: Diamond FFP 30: 6-24x50: *Skeleton HMD Reticle* (No. NSFFP62450HMD) (the PRR Reticle is different and does have thick outside posts!): Reticle at different magnifications: 6x: @ 13:44min | 16x: @ 14:14min |

24x: 14:31min:

https://www.youtube.com/watch?v=VOy2IWN7N_c

- ²⁸ Nikko: Diamond FFP: Nikko's *Skeleton HMD* reticle is used in several scopes and it does not have thick outside posts; the double lines used are just as thin as the rest of the reticle. Here is an example of the *Skeleton HMD* reticle, in the Diamond FFP 30mm 6-24x50: Reticle at different magnifications: 6x: @ 13:44min | 16x: @ 14:14min | 24x: 14:31min:

https://www.youtube.com/watch?v=VOy2IWN7N_c

- ²⁹ Element: Titan: 5-25x56:

MIL Ret. APR-1C: Likely from 5x–25x – recommended to play it with slow motion: @ 3:46min

<https://www.youtube.com/watch?v=eSGzTPkRxZY>

MIL Ret. APR-1C + APR-1D: @ 5:02min:

<https://www.youtube.com/watch?v=2CmHU4lhqQ>

MIL Ret. APR-1D: @ 6:50min:

<https://www.youtube.com/watch?v=0-C6DhTkDgw>

MOA Ret. EHR-1C + EHR-1D: @ 6:31min:

<https://www.youtube.com/watch?v=2CmHU4lhqQ>

Manual of all four reticles, at 5x and 25x:

<https://element-optics.com/wp-content/uploads/2020/10/5x7-TITAN-MANUAL-Amended.pdf>

Difference between Titan and Nexus (more expensive – because of lighter and smaller, with higher quality)

<https://www.youtube.com/watch?v=W4qdh7-v2mM>

- ³⁰ Element: Helix: 6-24x50 FFP:

APR-2D MRAD: 6x and 24x: @ 1:01min and 1:16:

<https://www.youtube.com/watch?v=DggOXpR2ymY>

APR-2D MOA: Reticle at all magnifications: @ 0:14min

<https://www.youtube.com/watch?v=YeWbkurVV0o>

- ³¹ Athlon: Argos BTR Gen. 2: 6-24x50 FFP: Reticle at min. and max. magnifications:

• APMR MIL reticle: <https://athlonoptics.com/product/argos-btr-gen2-6-24x50-apmr-ffp-ir-mil-copy/>

• APLR2 MOA reticle: <https://athlonoptics.com/product/argos-btr-gen2-6-24x50-atmr-ffp-ir-moa-copy/>

- ³² Hi-Lux: PentaLux: TAC-VF 4-20x50 FFP G2: 20x: @ 0:20min:

https://www.youtube.com/watch?v=NAbX_POUKgc

@ 5:12min:

<https://www.youtube.com/watch?v=dvzUNANmNXs>

- ³³ Swampfox: Kentucky Long: 4-24x50 FFP:

Cf. the other models of this series that have the same six-fold magnification range, resulting in the same ratio of reticle increase/decrease:

Kentucky Long: 5-30x56 FFP: MOA Reticle: Reticle at all magnification: @ 3:16min:

<https://www.youtube.com/watch?v=riYsEFSXYyw>

And also: Swampfox: Kentucky Long: 2-12x44 FFP: MOA: Reticle at 2x and at 12x(?):

<https://images-na.ssl-images-amazon.com/images/I/71%2B5YMUAXfL.AC.SL1500.jpg>

<https://images-na.ssl-images-amazon.com/images/I/71aX%2BZ5aDFL.AC.SL1500.jpg>

- ³⁴ Swampfox: Warhawk: 5-25x56 FFP: MOA Reticle: at 5x: @ 1:04min (very briefly, use slo-mo, or pause it):

<https://www.youtube.com/watch?v=fH5jleVgxE>

Cf. also the same reticle in the Kentucky Long models (several videos available; however the Warhawk has only a five-fold magnification range, as opposed to the Kentucky Long's six-fold, which means the reticle will increase/decrease 17% less).

- ³⁵ Shepherd: BRS: 5-25x56 FFP: Reticle at min. and max. magnifications:

BRS-MIL Ret.: <https://shepherdsopes.com/wp-content/uploads/2020/06/BRS-MIL-5-25x.jpg>

Also: <https://shepherdsopes.com/wp-content/uploads/2021/03/BRS-5-25-Instructions.pdf>

BRS-MOA Ret.: [not found yet]

- ³⁶ Hawke: Frontier 30 FFP: 4-20x50, Mil Pro 20x Reticle [No. 18530]: at 4x to 20x: @ 7:55min | And illuminated at night and during daylight: @ 9:09min:

<https://www.youtube.com/watch?v=E9SLP7RiaWg>

- ³⁷ Hawke: Frontier 30 FFP: 3-15x50, Mil Pro 15x Reticle [No. 18520]:

No video found so far, however, cf. footnote ³⁶ for the same reticle in an FFP scope, however there the reticle has to cover a 5-fold magnification range and thus will be much smaller at the bottom end of the magnification, and

much larger at the top end than the present 3-15x scope that only has a 3-fold magnification range.

³⁸ Hawke: Frontier 34 FFP: 5-30x56, Mil Pro Ext. Reticle [No. 18640]:

Cf. another model of this series that has the same six-fold magnification range, resulting in the same ratio of reticle increase/decrease:

Hawke: Frontier 34 FFP: 3-18x50, Mil Pro Ext. Reticle [No. 18620]: Reticle at all magnifications, illuminated:
@ 2:02min:

<https://www.youtube.com/watch?v=3ztkmBiv4lk>

³⁹ Riton: 5 Conquer: 5-25x50 FFP, MIL: Reticle at all magnifications: @ 8:52min and more at 12:39min:

<https://www.youtube.com/watch?v=kWvTDIOmMoc>

Reticle subtensions: MIL: <https://www.amazon.com/Riton-Optics-Conquer-5-25x50-MRAD/dp/B082DNFXKB>

Reticle subtensions: MOA: <https://www.amazon.com/Riton-Optics-Conquer-5-25x50-MOA/dp/B082DNVW2S>

⁴⁰ Riton: 5 Conquer: 4-28x56 FFP:

Reticle subtensions: MIL: Page 7: <https://ritonoptics.com/wp-content/uploads/2022/04/5-Conquer-4-28x56-Manual-2022.pdf>

Reticle subtensions: MOA: ?

⁴¹ Riton: 7 Conquer: 4-32x56 FFP, MIL:

Reticle subtensions: <https://ritonoptics.com/wp-content/uploads/2019/12/7Conquer4-32x56.RitonOptics.ReticleSubtensions.jpg>

or: <https://ritonoptics.com/wp-content/uploads/2022/04/7-Conquer-4-32x56-Manual-2022.pdf>

Reticle at all magnifications, with and without illumination: <https://www.youtube.com/watch?v=tpG7mCpb0v8>

Reticle thickness: The manual and the webpage do not give the thickness of the most basic reticle line, only subtensions and others. I had published in an earlier version of this Scope Specs Table a thickness of 0.02mil. This is wrong. The manual, when enlarged, shows this is the length of a short but both-sided hashline.

<https://ritonoptics.com/wp-content/uploads/2022/04/7-Conquer-4-32x56-Manual-2022.pdf>

Also, the video of the reticles does *not* give the impression that the reticle lines are 3 or 4 times thicker than most other scopes: <https://www.youtube.com/watch?v=tpG7mCpb0v8>

⁴² Arken: EPL4: 6-24x50 FFP:

MIL VHR Subtensions:

https://www.arkenopticsusa.com/ipx/w_1920,q_100/https%3A%2F%2Fcdn.sanity.io%2Fimages%2Fu57cw5zd%2Fproduction%2Fdaa6661e721237bec2a01cfd12962abab2540216-4005x4005.png%3Fauto%3Dformat%3Furl=https%3A%2F%2Fcdn.sanity.io%2Fimages%2Fu57cw5zd%2Fproduction%2Fdaa6661e721237bec2a01cfd12962abab2540216-4005x4005.png%3Fauto%3Dformat&w=1920&q=100

MOA VHR Subtensions:

https://www.arkenopticsusa.com/ipx/w_1920,q_100/https%3A%2F%2Fcdn.sanity.io%2Fimages%2Fu57cw5zd%2Fproduction%2F3917883977bc6e2f37f55eab92830f303f99d20d-4005x4005.png%3Fauto%3Dformat%3Furl=https%3A%2F%2Fcdn.sanity.io%2Fimages%2Fu57cw5zd%2Fproduction%2F3917883977bc6e2f37f55eab92830f303f99d20d-4005x4005.png%3Fauto%3Dformat&w=1920&q=100

⁴³ Bushnell: Match Pro ED: 5-30x56 FFP MIL:

Subtensions: https://www.bushnell.com/on/demandware.static/-/Library-Sites-HuntShootAccessoriesSharedLibrary/default/dw8dd6d632/productPdfFiles/MP53056DM-DMI_MatchPro_Manual_5LIM_1022_web.pdf

⁴⁴ Bushnell: Match Pro: 6-24x50 FFP MIL: Reticle at all magnifications, illuminated:

@ 9:43min: https://youtu.be/XT8v6Uwr_FQ?t=583

also: @ 13:47min: https://youtu.be/XT8v6Uwr_FQ?t=827

⁴⁵ Nightforce: NX8: 4-32x50 F1

MIL-C:

Note: The MIL-C reticle is sometimes wrongly depicted in seller webpages as not having thick outside posts.

Reticle at all magnifications: <https://www.youtube.com/watch?v=Sz2n06itBy4>

and also: @ 0:06min: <https://www.youtube.com/watch?v=nu2IE5DBJzo>

MIL-XT:

Important Note: The camera in this video was incorrectly set to automatic exposure. Therefore, the camera when filming a largely dark image (woods) increased the brightness of the image automatically. This caused the reticle lines *to be washed out* when they are in front of a light colored background (white

target). When the scope magnification was increased, the image was less of the dark woods and more of the white target, which caused the camera to adjust the brightness again – this time appropriate to the white target at lower brightness. This can be observed when at 0:13min the reticle lines suddenly are not washed out anymore but become visible very nicely.

Reticle at all magnifications: <https://www.youtube.com/watch?v=0P2F3lfapRc>

MOAR F1:

Not found yet.

Subtensions: Note: The reticle subtensions on the Nightforce webpage are probably incorrect because the reticle manual they offer (as of Jan. 2, 2023) gives the subtension measurements only for scopes other than the NX8 4-32x50 F1.