

THE BEST ACTION IN TRIALS AND MOTOCROSS

CLASSIC Dirtbike

#48

**Northern
British Bike
Pre-65 Trials
CHAMPIONSHIP**
www.northernbritishbikechampionship.co.uk
Dirtbike **ROCK OIL**

ISSUE

Forty-eight
Autumn 2018

**PRE-65
WINNER**
**SUPERMAC'S
DRAYTON TRIUMPH**

**CLASSICS
AT THE CASTLE
DRUMLANRIG 2018**

PLUS

**MOTO MEMORIES
TECH TALK
MONTESA COTA 200
BULTACO MATADOR**

SUPER PROFILE: ARIEL'S HT3



AN HOUR WITH: GERRIT WOLSINK



UNIVERSITY GRADUATE







Hunting for success

Short-lived in production form, Ariel's trials HT only really shone after the model was discontinued.

Words: Tim Britton **Pics:** Tim Britton, Mortons Archive

If any motorcycle has a legendary feel about it, then Ariel's big single trials HT5 has to be it. Pick up any issue of the UK motorcycle press of the early Sixties and there will be something somewhere about an Ariel trials bike winning an event. Sadly for Ariel though, such success was of little commercial value to them as the four-stroke range was dropped at the end of the Fifties.

In any case, the 'Ariel' doing the winning owed more to the talents of its rider and developer Sammy Miller than to the factory. This situation was not unknown for Ariel as their competition models in the Thirties were very successful for the factory, with team rider Fred Povey winning such things as the SSDT and the machinery becoming successful for the military during the Second World War – the company had high hopes for more competition success in the postwar period.

It did look as though that may be the case, but despite a win by Bob Ray in the 1946 British Experts Trial and a brilliant third in the 1947 Scottish Six days Trial, such success, as with Miller in the Sixties, was down to the rider rather than the machine. Now before Ariel aficionados collar me mob-handed at the next show, let me state the bike was actually a good machine but trials had changed and what was good in the Thirties was outclassed in the Forties and on.

The trials scene was further to change and in retrospect you can see the day of the big bike was numbered, even in the very late Forties. The sporting scene was developing at a rapid rate and no longer was it possible to have an all-round machine for the club rider. Hold on, I hear you say, what about the Gold Star, or perhaps the Triumph Trophy? Yes, both successful machines and yes both available with a wide range of accessories to adapt them to different disciplines, but in order to be successful in each, the comprehensive switchover from, say, trials spec to road race spec for the Goldie, amounted to a completely different machine.

There were people who did just that sort of thing and I recall a site foreman I worked with who had competed in club sport and somehow acquired a complete 'Goldie' package and his list of bits was immense and included gearboxes, sub frames and wheels and stuff. Ariel, on the other hand, had clung

to the ideal of a sporting all-rounder which was okay at a lot of things but not brilliant at any – I'm really going to have to keep my head down past the Ariel stand at Stafford but stick with me it's going to get better. The works riders were not too keen on this state of affairs and attempts to mollify them were made by introducing some special bits aimed at shaving off ounces... sadly what was needed was pounds chopping off.

To be fair, it should be remembered during this period there was a vast shortage of raw materials for any kind of production other than the military and exports. It should also be remembered the mantra of the day was 'rigid rear for trials' and while other sports were dabbling with a sprung frame there was resistance to this in the feet-up world. It was actually nonsense really as the main problem was more to do with few actually understanding the way a suspension unit worked – spring rates, damping, oil cooling and their effects on the way a motorcycle handled – than suspension being no good.

Still, the rigid rear was the way forward and Ariel produced the Competition Hunter model VCH which had the benefit of a shorter wheelbase and at 300lb was quite light for a 500. There were a lot of nice touches on the machine such as smaller fuel tank, a frame using aero quality tubing rather than ordinary stuff, alloy mudguards and the like, but it was still too little. The opposition was already using all welded frames and embracing rear suspension plus a degree of specialisation was creeping in as the realisation dawned that what was a good scrambler wasn't necessarily a good trials bike and vice versa.

By this time Ariel were no longer really considered an option for the serious competitor but that was about to change.

Cutting their losses with the VCH, Ariel produced a new two bike competition range with the HS for scrambles and the HT for trials and announced them in the *MotorCycle* of September 1955 – the 1956 model year. There were similarities between the two bikes, the engine of each model for instance had the same basic dimensions, the forks were similar, front brakes too but neither could be mistaken for the other. The trials model had an open all-welded lightweight frame where the scrambler wore a full



cradle duplex chassis. Recognising the stresses on a trials machine were much less than a scrambler, Ariel added lightness with alloy mudguards and an alloy petrol tank which wouldn't suffer as badly on the HT as they would on the HS.

Naturally there were those who proclaimed adding rear suspension units – two of them no less – and having to use a swinging arm as well would add a ridiculous amount of weight to the motorcycle. Oh, but hold on, didn't Ariel claim a dry weight of 290lb for the new 500? Yes, they did and that was 10lb lighter than the dry weight of the VCH rigid.

The HT makes its debut

Though our feature bike here is an HT3, its history is intermingled with the bigger HT5, though there are differences in the engine as the 350 dimensions are based on the NG model whereas the 500 is more like the VH roadster. Inside the engine each model has a steel flywheel assembly and there's lots of polishing gone on with valves and ports. Instead of the roadster's cast iron barrels on either model the HTs have an aluminium alloy casting with a nickel iron liner pressed in. There's a 5lb weight difference for the 350 over the 500, maybe the slightly shorter stroke of 85mm allied to its 72mm bore and the slightly less metal used in the construction will add up to that 5lb difference, maybe it won't. Whatever the case the Ariel was widely regarded as the lightest of the big bikes. It could have been lighter and it took Sammy Miller to take it to the nth degree and carve even more weight off this model, at least once he had freedom to do this when the model was discontinued.

As well as the frame there are a number of other

Above from left to right:

The HT3 engine is more akin to the NH model.

Silencer kicks up to keep its end out of streams.

Bolted on frame tube is steel, Miller had something lighter.

D-shaped trials speedo is rare.

Opposite:

Ultralight for its day, good looking too. This actual one is for sale too...

Below:

Oil tank is steel.

parts special to the HT, Burman provided a slightly redesigned gearbox, the GB47, which contained wider ratios and shorter shafts – but the main shaft was still long enough to have the Ariel clutch outboard of the primary case. The exhaust pipe and silencer are not only specific to the HT but the pipe will be slightly different for either capacity. Then there's the footrests, in these days of spring-loaded folding rests the concept of sprung steel footrests which bolt to brackets under the gearbox on the engine plates seem slightly odd. They or rather 'it' as it's a one-piece creation, are only seen on the HT and would likely be capable of pushing boulders out of the way. On our feature model the rests were in the spares box and some fabricated footrests, further back than the originals, were in place.

Topping off the motorcycle was a handsome two gallon alloy fuel tank which provided enough capacity for owners to ride their machines to and from a trial and compete in it too. As such a ride to an event may involve a round trip of 100 miles or so, a comfortable saddle was fitted, though strangely enough, Ariel chose not to use the waterproof and apparently very comfortable Dunlop rubber saddle but the heavier Lycett version.

A read through the Ariel sales brochure for the HT models soon shows they were capitalising on the 'lightest' machine tag as there is prolific use of the word 'light' in connection with the frame, the mudguards, the fuel tank and the front hub yet the frame is fitted with the most massive box section swinging arm known to the trials world and the oil tank is steel. Even though the front hub is alloy it is the same one used by the roadster models and in

DRY AND WET WEIGHTS

An interesting concept to claim the dry weight of a motorcycle is such and such as opposed to the wet weight. Just in case the difference is lost on you, what's being talked about is 'dry' in the sense of no fuel or oil in the tanks, rather than 'wet' which would in the HT's case include half a gallon of oil and some petrol. Now old-fashioned classic petrol – the stuff with lead in it – weighs in at 7lb a gallon and oil being thicker will be heavier, so let's say a ready to ride weight should be 12lb heavier. However, to keep the weight of the HT3 and HT5 to around 300lb ready to go, is still some achievement.





THE HERE AND NOW

As we hinted earlier, most Ariels in use today owe much to Miller's GOV132 and we've visited that model many times in the past. The most comprehensive feature about the famous bike was in issue eight and in the story Sammy detailed a few more bits and pieces which he could have tried to keep his Ariel competitive. He recalls spending hours fabricating an alloy kick-start which broke almost the first time it was used, these days almost all Pre-65s have an alloy kick-start from a modern machine as an example. Nor is it necessary to start with a complete bike to build a competitive Ariel as almost all parts and bits are available to build one from scratch. So, what are you waiting for?

his 1984 seminal work on the four-stroke trials motorcycles of the classic period, Classic British Trials Bikes author – yes and photographer and consummate trials enthusiast – Don Morley almost incredulously questions just how Ariel could manage to fit so many physically heavy parts yet still produce the lightest of the big bikes.

Now, in modern Pre-65 trials there are any number of Ariels being ridden quite successfully each weekend throughout the year and a quick check of the Pre-65 Scottish Two Day Trial programme states 28 Ariels were thumping their way around the highlands this year so that the model is popular is not in doubt. Though it has to be said the machines in use today bear more relation to the final, ultimate development of an Ariel, be it 350 or 500, than the factory produced HT3/5.

To go a little further on Don Morley's ponderings as to component weight, he

goes on to detail what Miller did while the factory still catalogued the model and so had to be seen to be riding as standard a bike as possible, as Ariel, in common with most of the manufacturers of the time, would claim their riders rode what the public could buy. Not that Ariel produced a vast amount of HT models for the public to buy and the smart money is on less than 500 in total over a four-year period and 40 of those being the 350 HT3 as seen here.

Interestingly, the HT3 we saw doesn't seem to have done a lot of trials work and other than the few bits and pieces taken off to protect them, has survived as a fairly standard machine. This is quite remarkable as in the Sixties, with Sammy being at the sharp end of the results on a regular basis, there was a trend to modify what HTs were out there. Miller himself marketed a package to update private owner bikes to his spec, except few could possibly do what he did. That

THE ARIEL COMPETITION HUNTER 500cc MODEL VCH

THIS MODEL has been specially designed for trials and competition work in which light weight and ease of handling are the most serious factors are the prime considerations. Although light in weight, this machine retains the robust construction characteristics of all Ariel products, and it can be relied upon to maintain its remarkable reputation as the World's Finest Sports Machine.

TECHNICAL DATA	
Wheelbase	44"
Overall length	64"
Handlebar width	25"
Saddle height	30"
Ground clearance	4 1/2"
Weight dry	200 lb.
Engine h.p.	31
Engine revs./min.	5400
Compression ratio	14:1
Gear ratio top	4.12
— 2nd	4.75
— 3rd	5.75
— 4th	6.75
— 5th	7.75
— 6th	8.75
— 7th	9.75
— 8th	10.75
— 9th	11.75
— 10th	12.75
— 11th	13.75
— 12th	14.75
— 13th	15.75
— 14th	16.75
— 15th	17.75
— 16th	18.75
— 17th	19.75
— 18th	20.75
— 19th	21.75
— 20th	22.75
— 21st	23.75
— 22nd	24.75
— 23rd	25.75
— 24th	26.75
— 25th	27.75
— 26th	28.75
— 27th	29.75
— 28th	30.75
— 29th	31.75
— 30th	32.75
— 31st	33.75
— 32nd	34.75
— 33rd	35.75
— 34th	36.75
— 35th	37.75
— 36th	38.75
— 37th	39.75
— 38th	40.75
— 39th	41.75
— 40th	42.75
— 41st	43.75
— 42nd	44.75
— 43rd	45.75
— 44th	46.75
— 45th	47.75
— 46th	48.75
— 47th	49.75
— 48th	50.75
— 49th	51.75
— 50th	52.75
— 51st	53.75
— 52nd	54.75
— 53rd	55.75
— 54th	56.75
— 55th	57.75
— 56th	58.75
— 57th	59.75
— 58th	60.75
— 59th	61.75
— 60th	62.75
— 61st	63.75
— 62nd	64.75
— 63rd	65.75
— 64th	66.75
— 65th	67.75
— 66th	68.75
— 67th	69.75
— 68th	70.75
— 69th	71.75
— 70th	72.75
— 71st	73.75
— 72nd	74.75
— 73rd	75.75
— 74th	76.75
— 75th	77.75
— 76th	78.75
— 77th	79.75
— 78th	80.75
— 79th	81.75
— 80th	82.75
— 81st	83.75
— 82nd	84.75
— 83rd	85.75
— 84th	86.75
— 85th	87.75
— 86th	88.75
— 87th	89.75
— 88th	90.75
— 89th	91.75
— 90th	92.75
— 91st	93.75
— 92nd	94.75
— 93rd	95.75
— 94th	96.75
— 95th	97.75
— 96th	98.75
— 97th	99.75
— 98th	100.75
— 99th	101.75
— 100th	102.75
— 101st	103.75
— 102nd	104.75
— 103rd	105.75
— 104th	106.75
— 105th	107.75
— 106th	108.75
— 107th	109.75
— 108th	110.75
— 109th	111.75
— 110th	112.75
— 111st	113.75
— 112nd	114.75
— 113rd	115.75
— 114th	116.75
— 115th	117.75
— 116th	118.75
— 117th	119.75
— 118th	120.75
— 119th	121.75
— 120th	122.75
— 121st	123.75
— 122nd	124.75
— 123rd	125.75
— 124th	126.75
— 125th	127.75
— 126th	128.75
— 127th	129.75
— 128th	130.75
— 129th	131.75
— 130th	132.75
— 131st	133.75
— 132nd	134.75
— 133rd	135.75
— 134th	136.75
— 135th	137.75
— 136th	138.75
— 137th	139.75
— 138th	140.75
— 139th	141.75
— 140th	142.75
— 141st	143.75
— 142nd	144.75
— 143rd	145.75
— 144th	146.75
— 145th	147.75
— 146th	148.75
— 147th	149.75
— 148th	150.75
— 149th	151.75
— 150th	152.75
— 151st	153.75
— 152nd	154.75
— 153rd	155.75
— 154th	156.75
— 155th	157.75
— 156th	158.75
— 157th	159.75
— 158th	160.75
— 159th	161.75
— 160th	162.75
— 161st	163.75
— 162nd	164.75
— 163rd	165.75
— 164th	166.75
— 165th	167.75
— 166th	168.75
— 167th	169.75
— 168th	170.75
— 169th	171.75
— 170th	172.75
— 171st	173.75
— 172nd	174.75
— 173rd	175.75
— 174th	176.75
— 175th	177.75
— 176th	178.75
— 177th	179.75
— 178th	180.75
— 179th	181.75
— 180th	182.75
— 181st	183.75
— 182nd	184.75
— 183rd	185.75
— 184th	186.75
— 185th	187.75
— 186th	188.75
— 187th	189.75
— 188th	190.75
— 189th	191.75
— 190th	192.75
— 191st	193.75
— 192nd	194.75
— 193rd	195.75
— 194th	196.75
— 195th	197.75
— 196th	198.75
— 197th	199.75
— 198th	200.75
— 199th	201.75
— 200th	202.75
— 201st	203.75
— 202nd	204.75
— 203rd	205.75
— 204th	206.75
— 205th	207.75
— 206th	208.75
— 207th	209.75
— 208th	210.75
— 209th	211.75
— 210th	212.75
— 211st	213.75
— 212nd	214.75
— 213rd	215.75
— 214th	216.75
— 215th	217.75
— 216th	218.75
— 217th	219.75
— 218th	220.75
— 219th	221.75
— 220th	222.75
— 221st	223.75
— 222nd	224.75
— 223rd	225.75
— 224th	226.75
— 225th	227.75
— 226th	228.75
— 227th	229.75
— 228th	230.75
— 229th	231.75
— 230th	232.75
— 231st	233.75
— 232nd	234.75
— 233rd	235.75
— 234th	236.75
— 235th	237.75
— 236th	238.75
— 237th	239.75
— 238th	240.75
— 239th	241.75
— 240th	242.75
— 241st	243.75
— 242nd	244.75
— 243rd	245.75
— 244th	246.75
— 245th	247.75
— 246th	248.75
— 247th	249.75
— 248th	250.75
— 249th	251.75
— 250th	252.75
— 251st	253.75
— 252nd	254.75
— 253rd	255.75
— 254th	256.75
— 255th	257.75
— 256th	258.75
— 257th	259.75
— 258th	260.75
— 259th	261.75
— 260th	262.75
— 261st	263.75
— 262nd	264.75
— 263rd	265.75
— 264th	266.75
— 265th	267.75
— 266th	268.75
— 267th	269.75
— 268th	270.75
— 269th	271.75
— 270th	272.75
— 271st	273.75
— 272nd	274.75
— 273rd	275.75
— 274th	276.75
— 275th	277.75
— 276th	278.75
— 277th	279.75
— 278th	280.75
— 279th	281.75
— 280th	282.75
— 281st	283.75
— 282nd	284.75
— 283rd	285.75
— 284th	286.75
— 285th	287.75
— 286th	288.75
— 287th	289.75
— 288th	290.75
— 289th	291.75
— 290th	292.75
— 291st	293.75
— 292nd	294.75
— 293rd	295.75
— 294th	296.75
— 295th	297.75
— 296th	298.75
— 297th	299.75
— 298th	300.75
— 299th	301.75
— 300th	302.75
— 301st	303.75
— 302nd	304.75
— 303rd	305.75
— 304th	306.75
— 305th	307.75
— 306th	308.75
— 307th	309.75
— 308th	310.75
— 309th	311.75
— 310th	312.75
— 311st	313.75
— 312nd	314.75
— 313rd	315.75
— 314th	316.75
— 315th	317.75
— 316th	318.75
— 317th	319.75
— 318th	320.75
— 319th	321.75
— 320th	322.75
— 321st	323.75
— 322nd	324.75
— 323rd	325.75
— 324th	326.75
— 325th	327.75
— 326th	328.75
— 327th	329.75
— 328th	330.75
— 329th	331.75
— 330th	332.75
— 331st	333.75
— 332nd	334.75
— 333rd	335.75
— 334th	336.75
— 335th	337.75
— 336th	338.75
— 337th	339.75
— 338th	340.75
— 339th	341.75
— 340th	342.75
— 341st	343.75
— 342nd	344.75
— 343rd	345.75
— 344th	346.75
— 345th	347.75
— 346th	348.75
— 347th	349.75
— 348th	350.75
— 349th	351.75
— 350th	352.75
— 351st	353.75
— 352nd	354.75
— 353rd	355.75
— 354th	356.75
— 355th	357.75
— 356th	358.75
— 357th	359.75
— 358th	360.75
— 359th	361.75
— 360th	362.75
— 361st	363.75
— 362nd	364.75
— 363rd	365.75
— 364th	36