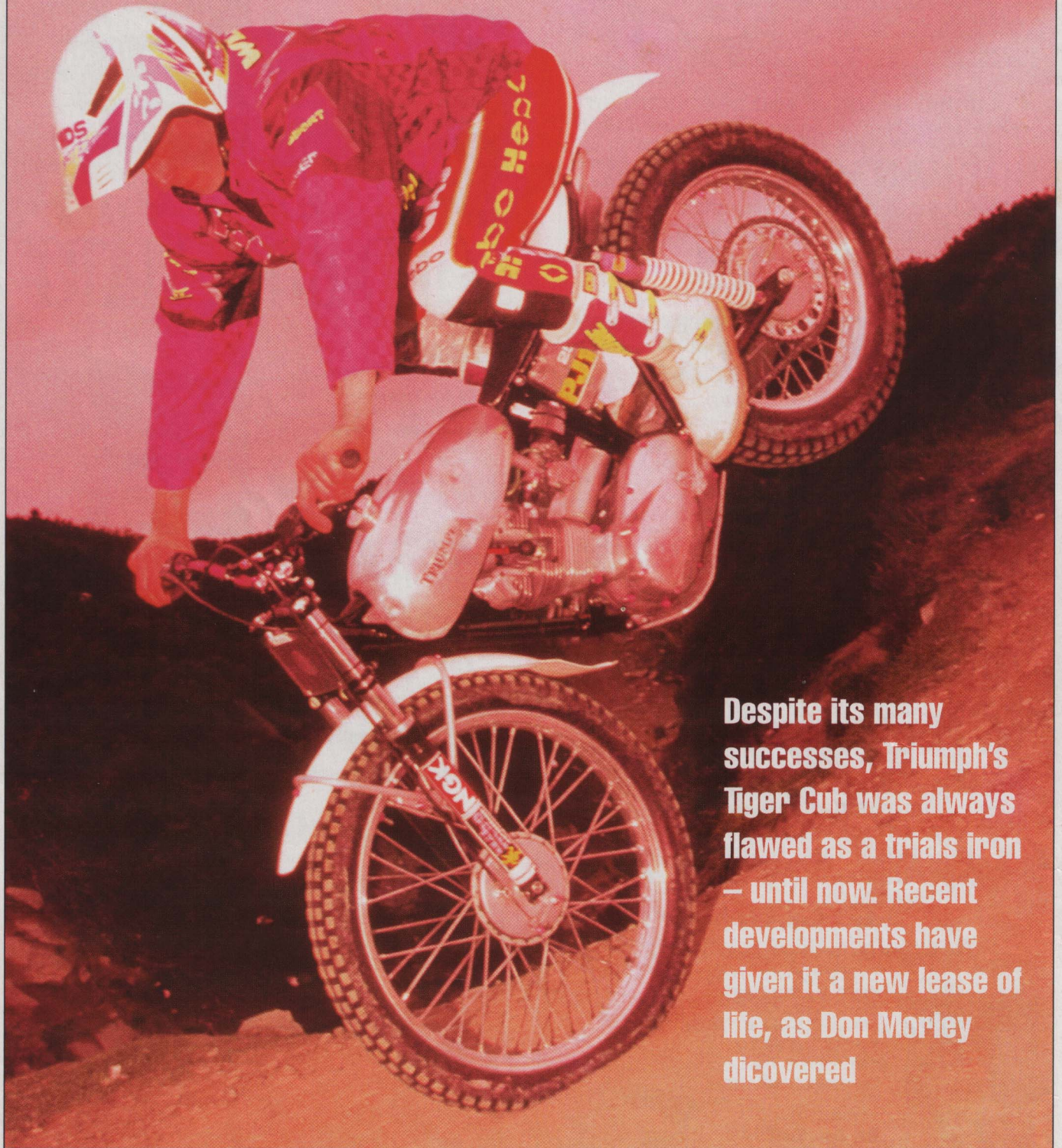


Matt pulls a stoppie for no good reason at all



Despite its many successes, Triumph's Tiger Cub was always flawed as a trials iron – until now. Recent developments have given it a new lease of life, as Don Morley discovered

Those of us who were there in 1959 did not realise it, but we had just witnessed the beginning of the end of the big bike era. Triumph's number one works rider Roy Peplow made history that year by winning the Scottish Six Days Trial, a first for any under-350cc machine.

Roy's victory came against all expectations for despite the efforts of

Greeves, Dot, James and Francis-Barnett big single cylinder four-strokes were still dominating trials and in the eyes of many no lightweight would ever win an event of this nature. "Pepoe", as Peplow was affectionately known, may have guided his little Triumph to a two mark advantage over runner-up Gordon Jackson's 350cc AJS (and four ahead of Sammy Miller's mighty 500cc Ariel), but the Cub was still perceived as very fragile model.

Both Triumph and Peplow already recognised this and experimented with such measures as over-boring or extending the stroke to enlarge the capacity to around 225cc. They had little success because any power increases simply highlighted the many weak points of the bike's chassis and engine. Neither Peplow nor Triumph's nifty little Cub ever won this trial of trials again, not least because the 199cc engine was giving away just too much power against

out cubbin'

BSA's rival C15T and the rapidly improving two-strokes.

So when the phone went and a Yorkshire voice asked, "Would you like to test ride the 250cc Triumph Cub that won yesterday's Pre-65 Scottish?" I immediately loaded cameras, pen and riding gear and headed north to meet Martyn Adams (the man behind the voice) and Matt Chambers, who had won the Pre-65 Scottish a couple of days earlier on the bike we were about to play with. Matt had started as odds-on favourite to win the Highland classic even though he had never ridden in it before — or for that matter in many lesser Pre-65 trials. However, the legends of his other exploits on the not-so-little Cub had certainly gone before him.

You see, Matt doesn't normally bother riding Pre-65 trials on his thirty-

year-old Cub; instead, he rides it with great success in the toughest of modern Open events against all the young riders and the technology their Gas-Gas, Montesa, Yamaha and Beta machines can throw at him.

Don't believe it? Well, Matt and Cub picked up a finisher's award in last year's Scott Trial, which is generally accepted as being the world's toughest one day event. No doubt he would have won a Silver

Spoon had it not been for two punctures, and overall winner Rob Crawford setting the fastest time in history — and Rob is one of the World Trials Championship contenders.

Add to that phenomenal achievements like a first class award in the Manx Two Day national and you will see why Has Beens (or Never Have Beens) and even the greats were somewhat in awe of the guy up in Scotland.

Then there's his rather special Cub. Martyn Adams, a young chap and a particularly good engineer unfettered by old ideas, has spent years looking hard at Cubs, their engines, and all their inbuilt design faults with a completely fresh eye. He has progressively sorted the Cub's inherent weaknesses properly rather than merely nibble at or amend them retrospectively, which, frankly, is all Triumph ever did.

Thus, on Martyn's engines, out goes the old Cub's flimsy cast iron crank assembly, replaced by heavier, beautifully crafted and polished flywheels, turned out of solid billets of EN24 steel. More important is Martyn's modification to the timing side mainshaft, through which oil is fed to the big end. Triumph's version was fixed and relied on an annular bush to

Matt Chambers and his pre-65 Scottish-winning Cub



Forks run Montesa stanchions and damping cartridges in Triumph sliders; front brake is very sharp

provide oil via the shaft. The problem was that this irreplaceable shaft was prone to wear, resulting in regular big end failures due to lubricant eventually being able to follow the wear path and bypass the big end.

Martyn's cranks soon became bywords in Triumph Cub circles, and they could also be supplied with different throws to give various capacities. His crankcases were re-machined to accept better oil pumps with vastly superior pumping rates. To finish the job he also makes and supplies a needle roller big end bearing

conversion, which can be fitted on an exchange basis to any Triumph Cub connecting rod, except those carrying Triumph casting identity code 3342.

I should also mention that Matt Chambers, a 33-year-old furniture salesman, is an extremely talented engineer with the rare extra ability of being an exceptional rider — in the modern stop-start-bounce-and-bunny-hop mould. He has little or no interest in Pre-65 events, with their five for a stop, even if you are balancing feet up. Mind you, he does admit to being physically sick with apprehension when it came to blasting non-stop up Pipeline, and knowing if he dropped a mark he would probably lose the trial!

His bike employs brakes that look like standard Cub items, but which are capable of standing the plot on its nose, or of stopping the back end dead in its tracks the moment they are applied. This can be very disconcerting for lesser mortals, as they seem to be even sharper than modern disc brakes.

He also opted for the one kilo heavier 67 x 70mm bore and stroke crank assembly made by Martyn Adams to give 247cc (as opposed to a standard Cub's 63 x 64mm). The bike's electrics are by Lucas, but Matt refuses to say more about them than that.

The front fork yokes and sliders are still standard Triumph Cub, but much lightened, and with a re-engineered



Very soft rear end has a monoshock feel

At 168lb this Cub is probably the lightest ever developed





247cc engine benefits from much post-factory development work by Chambers and Martyn Adams



Serco components include clutch pressure plate and engine sprocket, barrel, conrod and big end, and crankshaft assembly

higher handlebar position. They are coupled to Montesa stanchions and damping cartridges arranged to give a full seven inches of very soft front fork movement.

The Cub's normal 12 inch rear damper units have been replaced by a pair of similarly softly sprung 13.4 inch Falcon shocks, which have been moved slightly inboard and angled further over at their top mounting point. This gives the bike a very softly sprung, almost modern monoshock feel.

Matt was decidedly cagey about the Cub's steering head angle, but I could tell it had been changed, and would hazard a guess that the headstock had been angled down about 1.5 degrees. Otherwise the front frame was not much altered, and this mod would keep the standard Cub wheelbase despite having longer fork legs. I also noticed Matt had removed the frame's bottom tube entirely so as to raise the bike's ground clearance by about one and a half inches; to stiffen things up again he had welded a substantial extra rear mounting lug to the bottom rear of the engine to meet up with a matching frame lug.

Continuing the look around, the Cub had a larger section O-ring 520 rear chain, very sticky Michelin XII Trials tyres; they were tubed, but Matt is likely to modify the wheels to tubeless rims in the very near future. Virtually every nut, bolt, wheel spindle and Allen screw is made out of either aircraft grade HT alloy or titanium; former star road racer Mick Grant played a big part in this area. He also made the wonderfully crafted and ultra quiet alloy exhaust system, which helped to make this bike sound and feel very similar to Honda's relatively modern four-stroke TLR model. Even the front number plate has been spared no expense, for it is crafted out of carbon fibre.

When I asked searching questions about the gearing Matt got particularly coy. I noticed it was about as un-Triumph-like as you could get, with very low, ultra close ratios on the first three cogs and then a massive jump to a high top, but all he would concede was that it cost him over £500 just to get those ratios to his liking and he wasn't about to tell anyone else how it was done!

The bike had slightly taller gears overall than most riders would opt for, but not unduly so given it was specifically built to ride on the clutch. This was probably the most noticeable modification of all, being completely hydraulic in operation and as light to use as the proverbial feather.

Carburation was via a variable choke size Japanese Keihin. Matt claimed the bore averaged out at 19mm, but again wouldn't give further details. I recognised it as an ex-Honda component and it shouldn't be too difficult to identify it from our pictures, although the jetting would still remain Matt's secret.

He wasn't much more forthcoming about the big Cub's valve or cam timing, which I knew instantly owed little to any of the cams Triumph fitted as standard. Indeed, Triumph's originals were always compromise jobs supposedly suited for road race or sports, and in my opinion none of them was ever quite right for trials use. I can understand Matt's reluctance to disclose the results of all his hard earned development experience, but the good news is that he and Martyn may manufacture and market replicas.

Compression ratio is 8.05 to 1, using a very light Honda piston of undisclosed type but already available from Martyn, as is the tiny (16T) engine sprocket which allows a relatively large (14T) final drive sprocket coupled with a small 57T rear sprocket, collectively saving on chain length and weight.

Finally, the bike's all up wet weight (minus petrol) is a mere 168lb. This may mean little to most people, but is, for instance, a full 45lb lighter than the dry weight of a genuine late 1960's Works Cub, and even 28lb lighter than one of Sammy Miller's modern day conversions fitted with all the alloy bits.

When it came to riding the bike, I had been somewhat overawed watching Matt warm it up with an impressive repertoire of wheelies, stoppies, side hops and mono-wheeled wall of death turns over some very choice and unforgiving Yorkshire rockery. "Bugger that", I thought (if you will excuse my technical terminology), and as a very old fashioned trials rider — already conceding that I couldn't follow his example anyway — I took it off way out of sight to do my own thing far from prying eyes.

First impressions? Well, had I not known I could indeed have been riding a mid-80s Honda TLR250 like the one I owned and campaigned regularly in both twin shock and Bob Gollner monoshock form. But this Cub was almost unSTALLABLE whereas my old Honda had a very annoying and seemingly incurable habit of stopping for no apparent reason. Already it was one up to the Triumph.

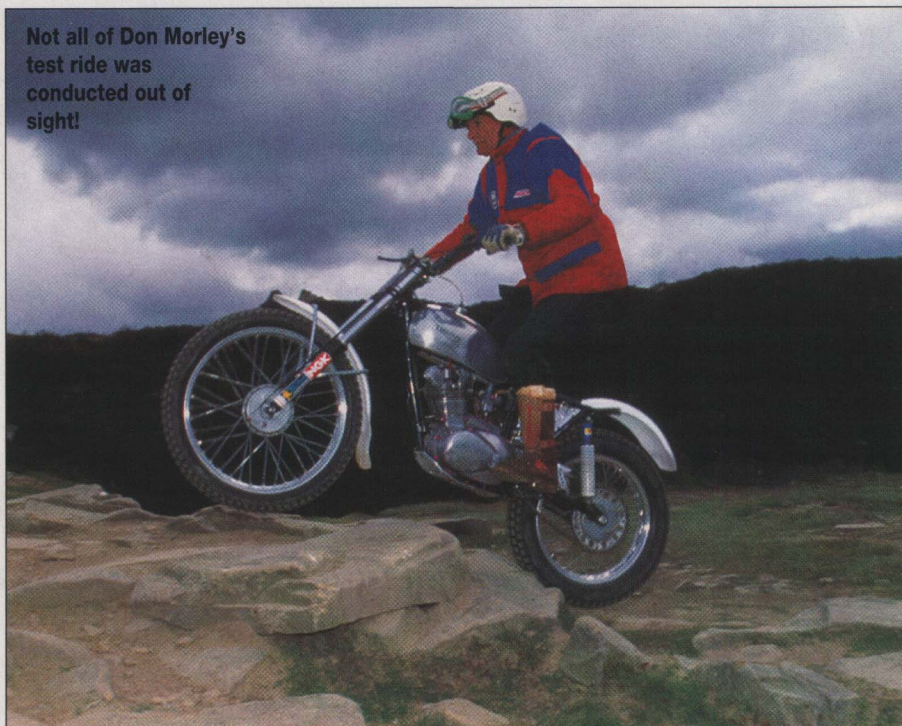
Frankly, I was nervous of pushing it too hard and more than a bit unsure about the gearing (taller than I would have chosen) but Matt's engine pulls so well I could, in time, come to believe it wasn't going to just stop on me when I was totally committed to bashing some blooming great boulder or other.

definitely was not quite right for me and my type of Pre-65 trials where any form of stopping costs a five.

No doubt some will have already written this machine off as a "cheat" bike. I would counter firstly that Matt does not ride it in Pre-65 trials — and I do include the Scottish in that, for the consistent lack of scrutineering in that event has seen the otherwise tough trial become little more than a mechanical cheat's charter. Secondly, believe it or not, I also began to wonder if Matt's bike was actually harder to ride for a traditional (or less talented) rider than a standard Cub.

The greatest pity was that I did not have a well sorted standard Cub to test

Not all of Don Morley's test ride was conducted out of sight!



So good was it at low revs that with the engine running and the bike stationary, I could let go of the clutch with the throttle shut and it would chunter off around the car park going tick-tock, tick-tock. To be able to do this without so much as a dip of the clutch may not be unusual on a 500cc Ariel, but it really says something about how well this Triumph Cub is set up.

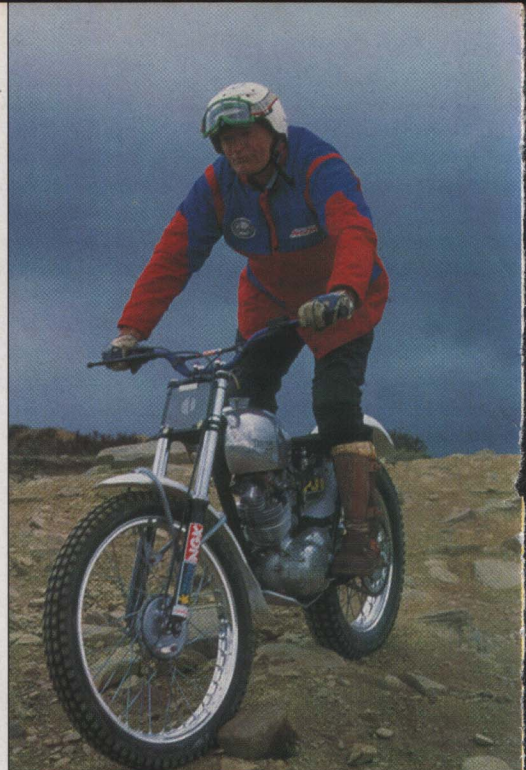
Open the throttle, however, point the bike in any direction you choose and off it goes again, chugging up and over whatever rocks or boulders impede its way. As you have probably gathered, I thought the engine's characteristics truly marvellous, with more than enough power coming in whenever you wanted it without any rush or histrionics, just fluid and completely controllable.

So far so very good, you might think, but the waters get a little muddier. This bike's suspension is of the duck and dive variety, which suits Matt and his modern style of hop about trick riding, but it

back to back against. If I had, then I might well have concluded the handling on Matt's bike was the more nervous of the two, though I could certainly have learned to love and live with it. Similarly, the hydraulic clutch was a shade too light and lacking in feel for this old fashioned rider, and I truly hated the brakes which, if so much as nudged, stopped the bike instantly even when I only wanted to check the bike's progress momentarily, for instance just prior to hitting a rock.


Matt and Martyn are of course right and I am wrong to criticise, for they are both top flight riders and this bike is a true thoroughbred set up to come into its own only when ridden with verve and skill. To put it another way, yes it truly was a fabulous bike, but maybe a bit wasted on me!

Despite this I loved it, but I can live equally happily with the more ample weight of my own Comerford Cub, which in turn seems sylph-like compared



A traditional trials rider might find this Cub too nervous for comfort, but everyone would love the engine

with the 340lb-plus Royal Enfield 350cc Bullet or even the 250cc Greeves I campaign more regularly.

Matt's Triumph Cub is an engineering wonder, bristling with fine touches and all those little things which collectively help to give any owner or rider a psychological advantage. It certainly made me wish my genuine Triumph forks worked a bit better, and come to think of it I wouldn't mind a little more compliance at the rear end (the bike's, not mine!). The brakes could also be improved, but then again are they unlikely to cast me on my ear'ole like Matt's. And by the way fellas, please can I borrow your engine? 



The team behind the bike — Matt Chambers and Martyn Adams