

Burton Section Newsletter #2 December 2020

This is our second newsletter. I have had a few contributions from section members, and I have written something a little technical about valve timing. If we get a fine day want a ride there is a “scatter” you can have go at, do a one, all or as many checkpoints as you like, maybe leave some for another day. I’ve also put together an article on using Gcodes in Google maps you might find interesting and I’ve put Gcodes in the scatter to help you find the checkpoints if you don’t have O.S maps. The article about google Gcodes is below the “Scatter” sheet and as it is nearly Christmas there might be on or two Christmas Cracker type funnies.

Some more contributions from **you** please if you want more newsletters. It doesn’t need to be long, a paragraph or two will do if you don’t have much to say.

We had a successful section **Zoom** meeting on Tuesday December 8th with nine people chattering away. I’ve suggested we have another one just before Christmas on Tuesday December 22nd and in the New Year one on January 12th. Details of the meeting I.D. and times will be sent nearer the day so you have time to get Zoom set up if you haven’t already. (The information on Zoom was in the last newsletter.)

The details for the section **Zoom** meeting at **8.00 pm** on **Tuesday December 22nd** are: -

Meeting ID: 937 187 9353 Passcode: BURTON.

<https://us02web.zoom.us/j/9371879353?pwd=TDJtZGtiZ25BV3pHek1JOWlsUIF6Zz09>

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Do you recognise any of the following symptoms?

1. Riding your bike makes you happy
2. Not being able to ride your bike makes you grumpy
3. You are compelled to stop what you are doing to watch a bike goes up or down the road.
4. You listen intently for any erroneous noise from your bike's engine
5. The sound of an old single is music to your ears
6. The sound of a V twin is a full symphony!
7. The smell of Castrol "R" is more provocative than Chanel No 5
8. You can't walk past a parked bike without giving it a thorough inspection
9. If you hear an engine that sounds like a bike you used to own it triggers a daydream
10. You always need at least one more bike to satisfy your needs

If the answer is yes to at least three of the above symptoms, then I am afraid you are a "**Bikaholic**" and to date the medical profession has not found a cure.

You will simply have to live with your addiction, learn to cope with the symptoms and more importantly keep getting your fix! *Bill Mantle*

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What kind of motorcycle does Santa ride? A Holly-Davidson

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Tony's Latest Project

I've had the remains of a pre-war single Triumph T70/T80 in the shed for many years. The bottom end of the engine was a spare for one of my race bike from the 1970/80's.

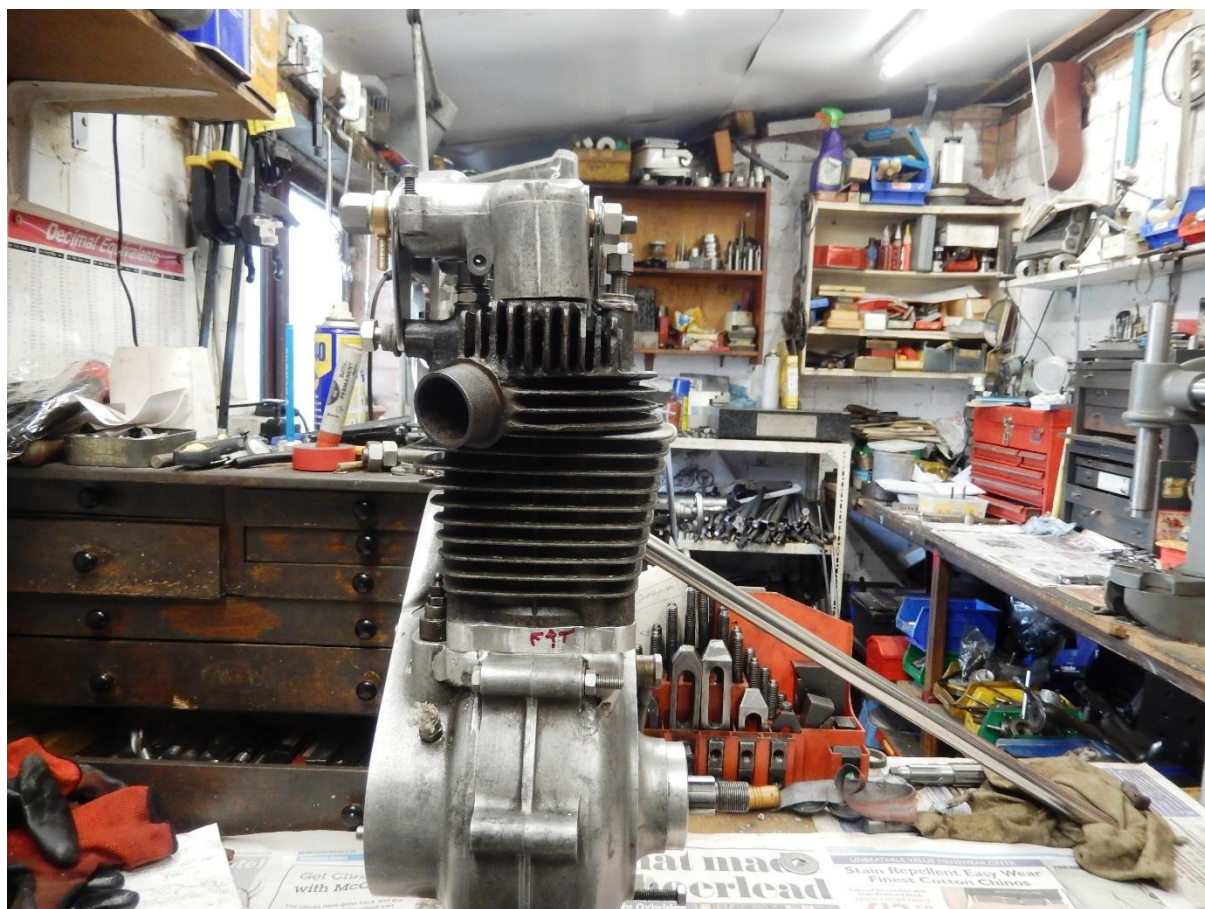
The original bottom half had a crowded cluster bearing with steep tapers on the crank pins into the flywheels. This was ok on the road but not so good when the revs went under racing conditions with the inevitable broken crankpins.

The std 350cc T80 engine was 70 x 89. I altered a pair of T70 flywheels which are 80 stroke to take a Venom crank pin and rod, using a 74mm piston to make the motor 344cc. This was about the biggest bore I could get without destroying the original barrel. I also altered the holes in the crankcase to suit the cylinder head holes and used through bolts to hold it all together. To put these in I had to weld the crankcase drive side to increase material to mover the hole centres to match the head.

I think all you people that detest folks like me destroying originality can leave the room. Please remember this was a long time ago.

This bike was sold many years ago after a very successful campaign after these mods were done. It did make the motor feel slower than the long stroke original and very bizzzy. However the lap times went down about 1.5 seconds everywhere.

Back to now then. I didn't have a barrel to go with the spare motor with the same set up. It's fitted with the Velo rod and new big end. Looking around I chose a barrel from a Harley 883. These have a 3" bore (76mm) and the liner will go out to 88mm. The stud holes needed very little alteration within the barrel and using the std Harley piston gives me a comp of 7:1 cr, fine for the road. The capacity will be 363cc. I had to make a barrel packer of about 15mm thick but the engine is still about 5/8" shorter than a std T80 motor. It still needs work but the cold weather has put a stop to play at the moment.





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Dogs can't operate MRI machines, but catscan

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Valve Timing

If you have a bike with a four-stroke engine it will usually have a train of gears or chains whizzing around turning the cams and shoving the valves open at the right time. When everything is running well you probably don't think about valve timing very often. What happens if you have had to do a major strip down and need to sort out where the cams are in relation to one another and the position of the crankshaft?

Most old four-stroke bikes will have the cams in a timing case integral with the crankcase. Some may have the cams mounted in or on the cylinder head. The "K" series Velocettes and some Norton singles, the CS and CJ models and the later Model 30 and 40 machines are examples. In most cases if you refer to your handbook or manual it will tell you about timing marks on the cam wheels, timing pinion and where to position your crankshaft when assembling. You just line up the marks and you are all set to get the covers back on.

What if there are no timing marks? In the manual, if you have one you find the valve timing figures and set up the engine with a degree disc and dial gauges and find the opening and closing points of the cams, e.g. Inlet opens 30° BTDC, closes 60° ABDC. This can take ages as you get the cams in roughly the correct position and turn the engine to read the numbers on the degree disc when the dial gauge shows start of lift. In this inlet cam example using the figures above if the start of lift doesn't register with 30° BTDC indicated on the degree disc you have to keep moving the camshaft and checking again until you get the opening point as close to 30° as possible, possible a long process. If you have separate camshafts then you have to repeat this for the exhaust camshaft.

There is however an easy way to shortcut this even if you don't now the degree numbers for opening and closing.

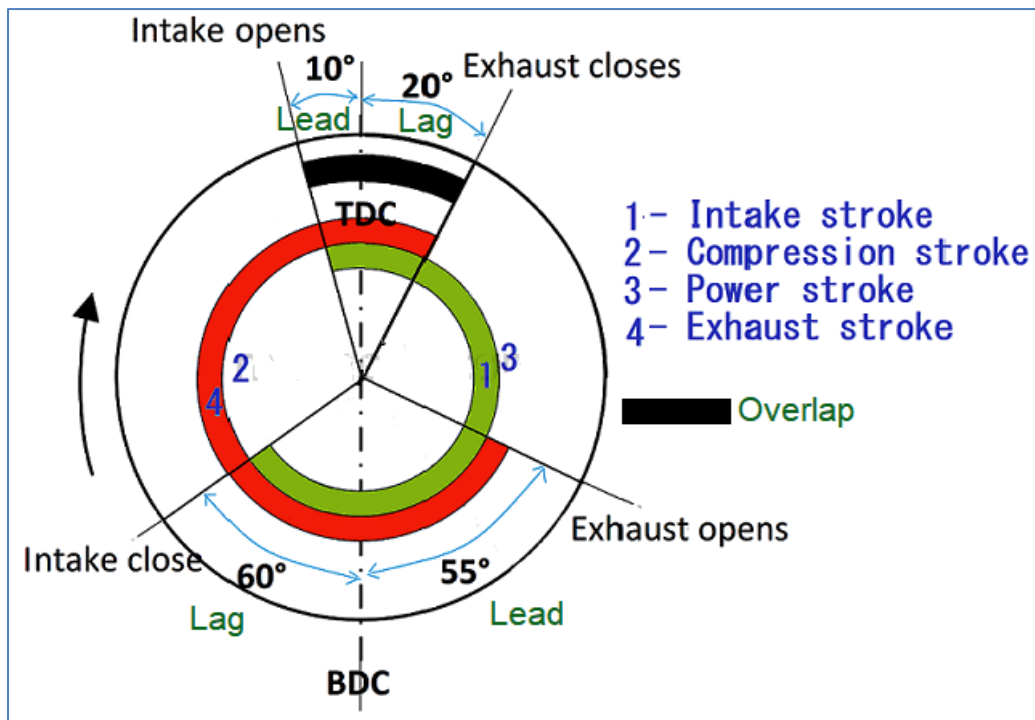
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On the diagram you will see that there is an area at **Top Dead Centre** on the exhaust stroke both valves



are open and the lift on each valve is close to equal with the inlet just starting to open and the exhaust almost closed. This is called the valve overlap. If look at the valves or pushrods at TDC and move the crank backwards and forwards a little you will see them “rocking” up or down about TDC. You will find that on most engines they will run well setting the cams to give equal lift at TDC on the exhaust stroke. Even if you don’t time your motor that way it's a quick check that you aren't a long way out and if you have to time a bike by the roadside, you now have an easy way to do it.

You can also use this method back in the workshop and get a more accurate timing by using the TDC on the exhaust stroke method and using dial gauges to accurately find equal lift and now that we are working accurately set it as close as you can to 4° **B**efore TDC on the exhaust stroke for optimum performance.

Below is a photograph of a Vincent twin engine on the bench with degree disc and dial gauges.





You will find that this 4° BTDC on the exhaust stroke works for most engines. Here is what Vincent Owners club member Tom Gaynor wrote on the VOC forum:-

“Incidentally, my enthusiasm for the "equal lift" method comes from my discovery that my 90 mph Rudge Ulster cam is equal lift (EL) at 4 degrees, my Manx Norton cams were EL at 4 degrees, my factory Honda race (HRC) cam was EL at 4 degrees, and my Gary Robinson 105 (a Vincent Mark II with more overlap) cam was also EL at 4 degrees. And according to Neville Higgins, so is the Terry Prince TPV cam. Must mean something...

My current Manx Norton, my previous Honda K4 racer, my Rudge Ulster and my Vincent, all have equal lift between 5 (the median value) and 0 btdc. Only one of these was set that way by me. The Honda (works camshaft) came that way. I asked the guy who takes care of my 86 bore Manx Norton (145 mph at Chimay last year), and who also builds all of Andy Molnar's 92 bore Manx engines (£27,000 a pop), if this was just coincidence. Nope. Any engine timed for equal lift within a few degrees of BTDC will fly. Ignition timing is far more critical and has to be right. (The Manx is 13.8:1) When I timed the Rudge, with a presumed hot cam for which I had no timing figures, I didn't bother with opening and closing figures, but set it for equal lift at TDC. I got about 3 degrees BTDC. Before being detuned (down from

maybe 7.3 to 7) it would touch 100 mph, now barely does 90. But cruises easily at 80. One swallow does not a summer make, but I think it indicative.”

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My partner broke up with me because I’m a compulsive gambler; all I can think of is how to win her back?

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John Earp Chats: -

Here we are on lockdown again (number 3 for me) it’s been a very different year - you may not know that I was supposed to be having my right shoulder joint replaced on March 23rd - an old injury caused after dropping my Pan European many years ago turning it round in Blithfield reservoir car park with my wife on pillion - I held the bike but dislocated my shoulder - the 23rd March turned out to be the original lockdown day and my operation was duly cancelled - much to my relief to be honest and I had a couple of enjoyable rides in May and June.

The first in May to Bridgenorth meandering alongside the Severn Valley railway line to Highley where we had lunch on the banks of the River Severn.



The Severn at Highley

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Parked at Highley



Hathersage

Mid-June found us at Whaley Bridge via Hathersage on a lovely sunny day. We'd gone to take some Triumph brake shoes to be re-lined but whilst we were there decided to look at the dam. It's over a year now since it nearly suffered a catastrophic collapse, this must have been an omen because my Honda nearly suffered a similar collapse in the shale covering the car park at the rear of the dam and only the combined push from Steve, Malcolm and Justin saved the day.



At Whaley Bridge





At Whaley Bridge



The Dam



The dam in the background

We rode home via Buxton onto the Leek road then arrived at Hulme End for a cooling ice cream before Justin led us on an interesting route back home.



Hulme End

In early June I'd had a phone call from the consultant to inform me he'd re-scheduled my operation for July 23rd, the only problem was my wife and I had to self-isolate two weeks before and two weeks after the operation and I had a Covid test 4 days before I was admitted to hospital then another six weeks after the operation before I could drive/ride again.

Anyway, the operation was a complete success, far better than I expected. At my pre-op the consultant had a long chat with me about how he'd struggle to repair my new shoulder if it was badly damaged again and I did contemplate selling all my bikes, however as they've been a part of my life for the last forty plus years it was a thought which came and went much to my wife's relief, she said I'd be too grumpy without them.

In the event I decided smaller bikes were the way forward and sold my Honda CB1100 which I'd always felt carried excessive weight and was an absolute pain to get on its centre stand and two other bikes plus my MZ which was written off back in May, so I'd got a much reduced fleet of bikes which to be honest I prefer as I often found myself riding a bike to give it a run out when in actual fact I'd rather be riding another.

In fact, I've since bought myself a nice little 250 Suzuki to add to my depleted collection and finally got my Kawasaki 250 triple running properly again and to be honest, I really enjoy riding bikes with smaller engines as you can get them buzzing but still be going legal speeds!!

We were lucky to slot a week's holiday in September and I must admit after a gap of around 15 years it was nice to visit Cornwall again. We had a lovely sunny week but I'd forgotten how narrow some of the back roads are. To be honest it made a nice change from being ripped off at airports, on planes and in foreign destinations and have a proper bag of fish and chips at the seaside and be in charge of my own destiny!! I've been out a few times since September including the Frostbite run. I'd actually intended going on the Autumn Leaves run but after having a flu jab the week before felt a bit under the weather so gave it a miss. A couple of weeks ago I ventured out to purchase a new bike battery and am pleased to report that the battery-operated heated gloves I bought back in February are well worth the money, in conjunction with my heated grips my hands were warm as toast. Anyway, that's about it from me. I'll not be going far once the roads have been salted and have treated all my bikes to a good dose of Startron Ethanol stabiliser over the winter months and some Esso Super Unleaded which is not supposed to contain any ethanol? *John Earp*

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I tripped over my wife's bra recently. It was a booby trap.

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Burton Scatter #1

David Giles and myself discussed ways of doing some Covid compliant rides for our members to do now or when the restrictions are gone. 🍷 If you want to go for a ride and want somewhere to go I have prepared a "Scatter" that goes roughly South East of Burton. Some might recognise a scatter as a sort of treasure hunt and some of you will already have done a scatter. The North Birmingham Section organised a large scale scatter earlier in the year with North, South, etc directions. Mick Leach did this scatter and said it was very good.

My scatter gives you points to visit and questions to answer when the point is reached. The location David has also prepared two scatters for use in the future.

- It could be done individually or maybe a few people might arrange to ride together depending if there are still restrictions. It should ideally be done on a bike but there is nothing to stop anybody doing it in a car and maybe involving a wife or other members of their family if it gets you out of the house. (Covid restrictions permitting.)
- Some sections have a “scatter” championship. We could maybe do this when things get back to normal if there is enough interest. I enjoyed planning the routes and I could do this in the comfort of my own home using OS maps, Google maps, etc.
- We thought that we would set a time limit for completion, e.g. a week, two weeks or maybe a month so people would plan their own route and could choose a day or days that works for them and do as many points as they wished on a ride. For now I am just putting this out there for you to have a look at and maybe use some of it you find a suitable time. (We sometimes get some nice weather days for a short ride even at this end of the year. 🍂)



Burton Section Scatter: South East

Name:

Location	O.S. / Gmaps + code	Question	Answer
Station Rd, Bagworth near Durham Walk	SK 444453 08700 MMF4+HC	Bagworth mine start and end years on the miners sculpture?	
Ashby Rd. Boundry Water Tower, A511.	SK 33452 19003 QF9V+2Q	What is the telephone number on the white ST Board?	
Breedon on the Hill Priory Church, off Squirell Lane, Breedon	SK 40611 23335 RJ42+CC	On the blue notice board, when was the monastery first founded?	
Tollgate Brewery Staunton Lane, Calke	SK 35900 21517 QGRJ+28	How many green portaloo's are there in the car park?	
Market Bosworth , Market Place.	SK 40599 03105 JHFX+J8	When was the memorial unveiled?	
Oakthorpe Picnic Site entrance. Ashby Rd - Willesley Lane	SK 32796 14318 PFGM+5M	On the entrance gate notice board what does it say welcome too ...?	
Packington , AshbyRd. X roads, Old Village Lock-up	SK 36168 14845 PGJM+2M	On the door notice who deeded the lock-up in 1997?	
Ticknall Main St, Village Lock-up	SK 35132 23906 RG6C+J2	In bus shelter next to lock-up, who presented the Coronation of Elizabeth II bench?	
Twycross , Leics. Junction of A444 and Sheepy Rd	SK 33691 04950 JFRW+FH	On the Stone Cross on the green, who was leading stoker on the Queen Mary?	
Village Lock-up, Church St, Worthington	SK 40827 20644 QJJ3+PG	Notice on door gives what telephone number for more information?	

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Why did the zoo put toast into a cage? It was bred in captivity

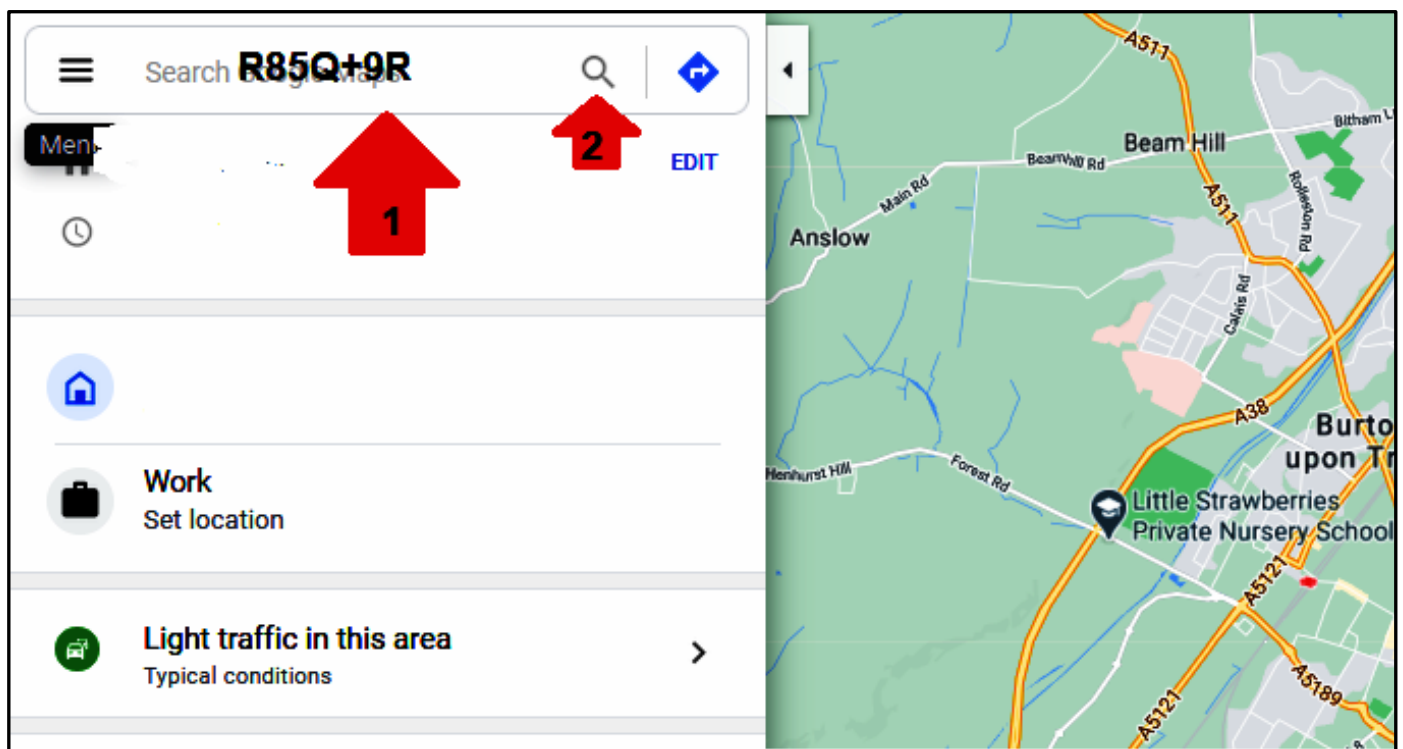
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Using Google Maps Plus Codes

Gmap + codes are an easy way give someone a location. If you enter a Gmap + code into the search box in Google Maps and the map will move to show you the place associated with the code.

To open Google Maps you can do a search for “Google Maps” in your web browser or type in or click this link: <https://www.google.co.uk/maps/> .

Google maps will open. The top left of your screen will look like “Picture 1”. On the side panel you can enter the name of a place or an address you want to find in the search box indicated by “Arrow 1” and clicking the magnifying glass symbol indicated by “Arrow 2”.



If you have a Gmap + code you can Type or copy and paste it into the search box.

Picture 1. Close up of the screen showing the side panel at the top left.

(If you do not see the side panel, click as indicated in Picture 2 below to open it.)



Picture 2.

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Have you ever noticed that Ireland is just one sea away from Iceland?

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Changes in the Number Plate Law

From the FBHVC: Published: 10/12/2020

We have today received information directly from DVLA concerning information on black and silver number plates which will take effect from 1 January 2021.

DVLA kindly requested we share this information with you....

This note is to tell you about important changes being introduced on 1 January 2021 that affect the ability of vehicles registered in the historic tax class to display the old style pre-1973 black and silver number plates.

Following the change in definition of a historic vehicle for vehicle tax exemption purposes in 2015, an issue was identified in the regulatory requirements for the valid display of a black and silver number plate. This resulted in an unintended consequence where any vehicle over 40 years old and registered in the historic tax class would be permitted to display an old style black and silver number plate. This was despite the law previously requiring all vehicles first registered after 1 January 1973 to only display the yellow and white number plates with black characters.

As this was never the intention, we have sought to rectify this through a legal correction which will shortly be implemented. The change seeks to prevent any vehicle constructed after 1 January 1980 from the ability to display the black and silver number plate despite being recorded in the DVLA's historic tax class. Those vehicles with a construction date prior to 1 January 1980 will continue to be able to legally display black and silver number plates to avoid any undue costs of replacement.

Your members may also wish to note that from 1 January it will no longer be permissible to fix a new number plate displaying a Euro symbol. Number plates already fixed to vehicles are unaffected. We will also be introducing a new British Standard for number plates produced from 1 September

2021 which will mean all current style number plates that are first fixed to a vehicle from that date must meet the technical requirements contained in that standard.

There is lots of useful information on the FBHVC website: e.g. DVLA MOT & TAX Exemption, guides to getting an original registration number, etc. <https://www.fbhvc.co.uk/>

Three Wheel Scooter

Brian Slack took this picture of my brother John having a test ride on this three-wheel, banking scooter in Marston's car park after a Burton Parade. We think it was owned by Colin Lambert from Tutbury. It was an NV50 Stream made by Honda which would explain why the Japanese built machine was a damned site better than the three-wheel thing with a Dutch Ankor engine that BSA made and badged as an Ariel. (Honda actually bought a licence from Wallis & Sons who first designed this banking three-wheel concept.)



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Why is your nose in the middle of your face? It's the scenter

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Eddy finds that getting this newsletter done quickly has not been helped by the Covid 19 restrictions.

Merry Christmas everyone.

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Provisional Calendar 2021

Covid restrictions mean that this is **very** provisional. We hope things improve that some of these events can actually take place. 🍷

The Section meets on the second Tuesday of each month at Marston's Sports & Social Club, Shobnall Rd, Burton-on-Trent.. Website burtonsectionvmcc.co.uk

Date	Venue and Time	Contact
January 13 th WEDNESDAY	Slide Night 8.00 pm Marston's	
February 9 th	Club Night 8.00 pm Marston's	
March 9th	Club Night 8.00 pm Marston's	
April 13th	Club Night 8.00 pm Marston's	
May ? TBA	Aviation Wolds Run	
May 11th	Club Night 8.00 pm Marston's	
June 8th	Club Night 8.00 pm Marston's	
June 22nd	Chip Shop Run 7.00 pm Marston's	
July 4 th	Easy Does It (Pre1960 and upto 250cc 1971) Marston's 11.00 am	Mick Leach 01283 815487
July ? TBA	Hatton Carnival	
July 13th	Club Night 8.00 pm Marston's	
July 27th	Evening Run + Pie and Peas - 7.00 pm Marston's - Pre- book	Brian Slack 01283 544500
August / TBA	BBQ Pat & Shelley – Kingston from 3.00 pm ST14 8QW- Gmap	
August 8 th	Tax Dodger's Run (Tax exempt bikes only)	Mick Leach 01283 815487
August 10th	Club Night 8.00 pm Marston's	

August 22 nd	Evening Run – Last of the Summer Wine - 7.00 pm Marston's	
September ? TBA	Draycot Show – Arrive before 11.00 am	
September 14 th	Club Night 8.00 pm Marston's	
September 19 th	Breakfast Run 7.30 am Marston's	Pre- book Brian Slack 01283 544500
October 3 rd	Autumn Mist Run Start 10.00 Conkers	
October 12 th	Club Night 8.00 pm Marston's	
October 26 th	Harvest Supper 8.00 pm Marston's	Pre- book Brian Slack 01283 544500
November 7 th	Frost Bite Run 10.00 am Tutbury Car Park	Vic Carrington-Porter 01283 619489
November 9 th	Section AGM 8.00 pm Marston's	
December 14 th	Beer & Skittles 8.00 pm Bridge Inn	Vic Carrington -Porter 01283 619489