Engine – Old Crankshaft

OLD SKOOL ENGINE REBUILD - AGAIN

LOOK AT THAT CRANK NUMBER!

Modern crank builders would love to build that many cranks. This crank I did 31 years ago and it came out of a running road race engine I did way back then.

This is a 60mm crank converted the MB way to a Rotax Microlite con rod 115mm long. A rod I used to great effect on the road and on the track winning British and European championships. The last time I bought one of these rods they were well over £200 and that was 10 years ago!

What's special about this con rod is it used a 18mm gudgeon pin, which let you safely use a Japanese quality piston without needing stupid bushes and shims to sleeve back down to the standard 16mm bearing.

This crank was 4 years into special one off cranks that I used to make for lots of people, as the cranks at the time was just junk. These one of cranks paved the way for much higher powered engines are were the basis of the manufactured cranks you see today.

After 30+ years of one off crank and crank pin manufacturing there's not a lot I don't know about cranks, and I would say to some, when you're buying these modern one off cranks be very aware – especially with no crank shims fitted!

This engine was running when it came in and the customer wanted it rebuilding and modernising. This will be 4 engines I've build for this customer over that time.

Yes it's old – but with some cleaning up and a few thread repairs its going back together nicely.

And I've to do the cylinder as I did it 31 years ago as he was so happy with the power it gave out and no engine in that time could keep up with him. Basically it was the same as the British championship group 6 motor I did.

Today I prefer to use more standardised set ups! Make it simple for the customer and us, easy buy cranks and piston and kits that work and you can get spares most places if need be.

If someone wants a crank re rodding I just say 'buy a new bgm or sip' both in the last few years have proven to be perfection and it saves my arthritic wrists from pain.

When I build cranks they are so tight I need a 3lb copper hammer to line them up. And it can take as much as 50 hard blows to move 0.001'', I have to wear padded gloves and my left hand can hurt for weeks afterwards. So I really

don't go out of my way to build cranks these days.

A 3lb copper hammer is heavy, compared to a 1/2lb copper hammer that I've used to spin a modern crank nearly a full circle.

Be careful out there!



60mm x 115mm con rod MB conversion from the 90's



 ${\tt I}$ use to number each web so matched cranks stayed together



Early 1990's special TS1 engine casing been prepared for another rebuild, this wasnt welded by me, those holes will seal on assembly



First fix, in the engine assembly jig to fit engine mounts, rear hub and drive bearing with our MB tools



Old Skool crank checked on out old skool alpha crank true



Professional engine building at its best



Crank fitted and turning free, ready for the rebuild