



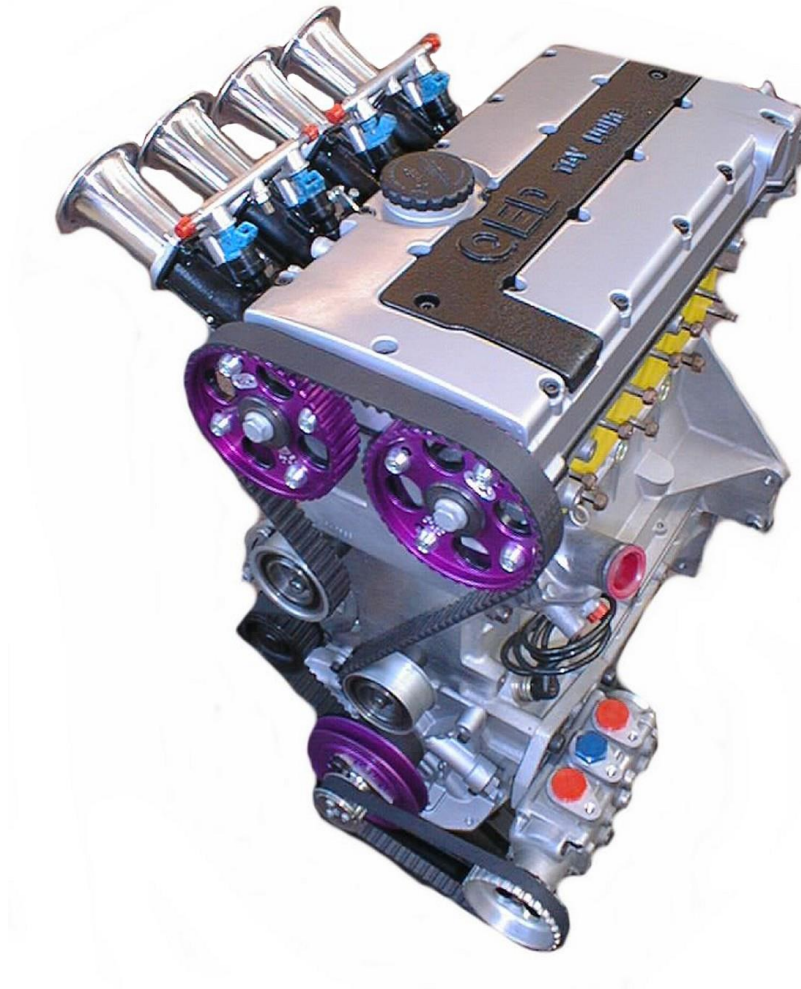
QED Motorsport Ltd

Order online: <http://qedmotorsport.co.uk>

Tel : +44 (0) 1509 412317 | Fax : +44 (0) 1509 416555

4 Soar Road, Quorn, Leicestershire, LE12 8BN, UK

Vauxhall C20XE



## PRODUCT CATALOGUE

FEBRUARY 2018

~ Worldwide parts dispatch via Royal Mail and DHL ~

~ All major credit and debit cards accepted ~

~ Orders received before 2pm are processed same day, subject to availability ~

All prices shown are in pounds sterling.

UK and EC customers who are not VAT registered must add 20% VAT

Our price list is frequently updated but please check the website for current pricing



Our range of products has been developed for professional use in motorsport applications. It is expected that anyone using our products will have experience of working on engines and will follow normal engine workshop practice. It is the responsibility of the fitter to ensure that all components are sized, assembled, and fastened correctly to perform without future failure. We accept no responsibility for damage caused either to or by our products as a result of incorrect or inappropriate assembly or fitment.

We accept payment by cash, cheque, direct bank credit transfer (details available by request), credit card (Access or Visa), or by debit card (Switch/Solo). Cheques should be made payable to 'QED MotorSport Ltd'. For credit card transactions we will require the cardholder's name and address, the card type, card number, expiry date, and start or issue date if applicable. Goods will only be dispatched to the cardholder's address except by prior arrangement and solely at our discretion.

All goods remain the sole property of QED MotorSport Ltd until full and complete payment has been made.

All of the prices herein are quoted in pounds sterling and do not include VAT. Customers within the UK will be charged VAT at the prevailing UK rate. Customers outside of the UK but within the EEC will be charged VAT at the prevailing UK rate unless the customer provides a valid VAT registration number and accepts liability for the VAT payment. Customers from outside of the EEC will not be charged VAT.

A charge will be made for packaging and delivery. Unless specifically requested choice of courier will be at our discretion.

If goods that we have supplied are no longer required and are returned to us within 14 days of receipt in an unused, undamaged condition, we will refund the value of the goods less a 10% handling charge. If an order is cancelled subsequent to its dispatch the same handling charge will apply.

Due to the varied nature of the applications for our products customers may wish to carry out mechanical modifications. If the product is permanently altered by any such procedure then QED will be unable to refund based on full price in the unlikely event that the product is later returned.

*Any other notes included herein are suggested guidelines only; if you are in any doubt about any aspect of your engine work then please consult a professional workshop.*

# VAUXHALL XE 2L 16V DOHC

## CAMSHAFTS

The QED range of camshafts is the result of many years of engine building experience and extensive development work conducted on our in house dyno facility. The range of cam profiles we offer as a result is suitable for a wide range of predetermined applications (fast road, rally, hillclimbing, etc). When matched with other proven motorsport components the cams detailed below form the basis of our performance upgrade kits.

For simplicity the names of our cam profiles are designated by the approximate lift given by that cam. For example our Q46V camshafts have 0.460 inches of lift.

All of these camshafts are available on new OE specification blanks. Alternatively the Q42H, Q38H and Q420 profiles are available as re-profiles of existing cams.

Because of the vigorous acceleration of our cam profiles many require a solid cam follower (see below).

- Q42H** The mildest camshaft in our range; quite able to be fitted to standard engines without the need for further mechanical modifications. When used with a suitably modded ECU this cam helps produce 185 bhp. Also an easily fitted cam to use with carburrated engines, producing 190+ bhp.
- Q38H** A more vigorous hydraulic profile not liked by Motronic ECU's. With carbs or throttle bodies 190+bhp is easily achieved. Possible to fit without piston modifications, but deeper valve pockets required when using optimum valve timing.
- Q420** The cam to use in carburrated engines for fast road use and club level motorsport. Can be fitted without valve spring modifications, but deeper valve pockets are required and a raised CR is preferable. A well built engine gives 170 ft/lb torque with 215+ bhp. A non-hydraulic profile.
- Q450** Our most popular cam now used successfully in practically every field of Motorsport as well as in Many fast road cars. This cam gives a comfortable 225 bhp on a lightly modified carburrated engine, but is capable of up to 245 bhp from a no compromise fuel injection unit.
- Q450V** Although the Q450 profile is very good we have managed to improve it. By manipulating the opening characteristics to give greater valve area (rather than by increasing peak lift or overall duration) we have maintained the peak power of between 225 and 245 bhp but with improved torque throughout the mid range.
- Q440** An easy to drive race profile used by some as a rally shaft. 180 ft/lb torque at a higher point in the rev range than the Q450 profile gives a potential 250+ bhp. A non-hydraulic profile.
- Q46V** Definitely a race only shaft with 330 period. Maximum torque is similar to the previous 2 shafts, but appears at 6500+rpm and with correct valves and ports will show in excess of 260 bhp. A non-hydraulic profile.

## CAM FOLLOWERS

The standard hydraulic cam follower, whilst doing an excellent job in the standard engine, can cause considerable power losses when subject to heavier spring loads, faster rates of valve acceleration and high engine speeds. Two encountered problems being:-

- 'Pumping up' when the valve hardly makes contact with its seat or even remains partly open.
- Loss of imparted movement i.e. the valve is not moved its desired distance due to entrapped gases being compressed, and imparting a spring like property to the follower.

To go with our more vigorous cam profiles we offer two remedies

- Firstly an insert for the standard follower, which in effect makes it solid. This is very cost effective and easy to fit item.
- The second approach is to use a much lighter one-piece steel cam follower. The QED follower is made of high alloy steel, plasma nitrided, with a lapped contact face. The weight saving makes life easier in the valve spring department when things become marginal as with some race profiles.

With either of the above methods, a means of adjusting the valve operating clearance must be provided. QED provides a simple 'top hat' shim, which sits on the valve tip. These are made of through hardened carbon steel, requiring no after treatment, and are stocked in a range of sizes.

### QED MotorSport Ltd

All prices are quoted in pounds sterling and do not include carriage or VAT

Tel: (+44) 01509 412317 Fax: (+44) 01509 416555

Order online: <http://qedmotorsport.co.uk>

# VAUXHALL XE 2L 16V DOHC

## VERNIER CAM PULLEYS

In order to ensure optimum performance it is essential that your camshafts open and close valves at the correct point in the engine operating cycle. This is referred to by most as cam timing. At the least, incorrect cam timing will lose some bhp, at the worst valve/piston contact may occur and many an engine has been reduced to a box of scrap when a touching valve head drops into the cylinder at high revs. To accurately set your cam timing, QED offer vernier cam pulleys.

Very easy to use, these pulleys feature a central hub to which is bolted the outer toothed pulley wheel. The hub bolts onto the camshaft as normal. By slackening the pulley bolts, the relationship of tooth position to camshaft is infinitely variable enabling cam timing to be accurately set.

We suggest cam timing be accurately checked even on standard engines and corrected by vernier pulleys if more than a degree or two out. These pulleys come as standard in certain of our cam kits

## VALVES

For an engine to achieve it's optimum power output there must be adequate gas flow through the cylinder head. We offer a range of valves to optimise gas flow through the cylinder head.

QED hiflow valves have a standard sized valve head diameter but a wasted valve stem to improve gas flow past the valve.

QED oversized valves have a wasted stem, as the hiflow valve, but also a valve head diameter 1mm larger than standard.

QED 5mm valve stem valves have, as their name suggests, a narrower than standard valve stem helping to improve gas flow and also reducing valve weight.



Standard < > Hiflow



Standard < > Oversize



Standard < > Narrow Stem

## VALVE GUIDES

Standard iron valve guides require generous lubrication to operate safely at high rpm. At the high temperatures experienced in race engines the relatively small amount of oil that is providing lubrication for the valve guides can start, quite literally, to boil away.

All QED engines are built with valve guides made from a Colsibro bronze material, which will operate without failure even with minimal lubrication.

## VALVE SPRINGS

For mildly tuned engines the standard valve springs are quite adequate, however in a modified engine there are two potential failings of the standard springs.

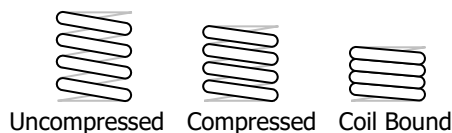
If a more aggressively profiled camshaft achieving greater lift is used then standard springs can become 'coil bound'. This happens when the springs have been compressed so far that the individual coils of the spring touch. At this point the spring cannot be compressed any further and any more lift from the camshaft will simply damage the coil bound spring rather than lift the valve.

Coil binding of standard springs typically occurs when cams with lift in excess of 0.430 inches are used.

One further limitation of the standard springs becomes apparent with the high rpm used by most race engines. With increasing engine speed the spring is required to close the valve in an ever-decreasing time span. Having to provide this increased rate of valve acceleration effectively work-hardens the springs making them brittle. Inevitably the springs will then fail.

For this reason an engine that regularly uses over 8000rpm should be fitted with race quality springs.

Separate race quality valve springs are also available for use with QED 5mm stem valves.



### QED MotorSport Ltd

All prices are quoted in pounds sterling and do not include carriage or VAT

Tel: (+44) 01509 412317 Fax: (+44) 01509 416555

Order online: <http://qedmotorsport.co.uk>

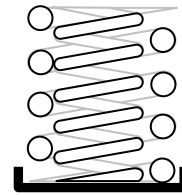
# VAUXHALL XE 2L 16V DOHC

## VALVE SPRING PLATFORMS

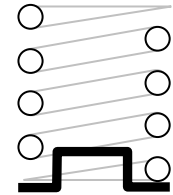
The XE engine exists in two formats, most easily recognised by differences in the belt train or by reference to the engine number (up to 14142838/from 14142839). A less apparent difference between the engines is in the valve spring platforms.

On the later engines the valve spring platforms were redesigned as a shallow 'top hat' shape, which gives more positive positioning for the standard valve springs. The improved support and positioning make these later platforms the best option for an engine using standard valve springs.

However for an engine using race quality, double springs a flat valve spring platform, as found in the earlier engines, is required since the raised section at the centre of the later platforms makes it impossible to fit the inner spring used in a race spring pack.



Early Platform  
with double spring



Later Platform  
with single spring

## PISTONS

The standard engine is already blessed with a very strong, forged piston courtesy of Mahle. However they do not offer high compression, nor do the valve pockets allow for oversize valves or high lift cams. We offer a range of forged pistons to achieve both high compression and larger valve pockets.

- Our flat top piston as the name suggests, has no dish in it. This means that despite having race sized valve pockets the piston still achieves a compression ratio of 11.0:1. Available in 86.0, 86.25, 86.5, 87.0 and 87.5mm.
- Next we have a high intruder competition piston which also has large valve pockets, compression ratio 11.6:1, and is available in sizes 86.0, 86.25, 86.5 and 87.0mm. The weight of one piston complete with rings and pin is 435 grams. (Standard Mahle piston is 460 grams)
- For ultimate race and high-speed operation we also offer a full slipper, high compression piston. This weighs only 330 grams and features a 20mm pin. It does require the use of special, longer, small pin lightweight rods.

**FLAT TOP**



**HIGH INTRUDER**



**SLIPPER**



## QED MotorSport Ltd

All prices are quoted in pounds sterling and do not include carriage or VAT

Tel: (+44) 01509 412317 Fax: (+44) 01509 416555

Order online: <http://qedmotorsport.co.uk>

# VAUXHALL XE 2L 16V DOHC

## ENGINE MANAGEMENT - IGNITION

The standard engine management package gives good ignition control for an unmodified engine however for a modified engine the system is all but useless since the timing cannot easily be altered.

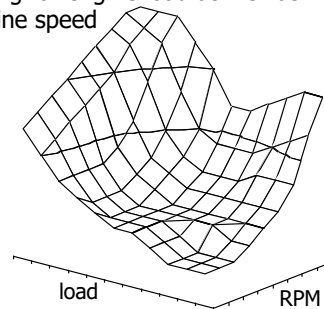
In an engine fuelled via carburettors, where an engine management system is not strictly speaking essential, we have seen a variety of ingenious, and in some cases dubious, techniques for controlling ignition. Many involve adapting the distributor body to trigger and time the ignition (its usual role is just to point the spark at the right cylinder). Although the various techniques employed will work to a greater or lesser degree, even those that do achieve acceptable spark placement can only, as a result of their mechanical nature, provide a gradual advance of the ignition timing.

By contrast an electronically controlled ignition system is variable throughout the rev range and can provide the kind of non-linear advance progression more suitable for the XE engine. By utilising the existing 58-tooth trigger disk, mounted on the standard crankshaft, an electronic control system has a convenient and highly accurate method for determining engine speed.

For the majority of applications the ignition management systems that we supply are from DTA. Principally these are controlled by engine speed, which as mentioned above is measured using the standard sensor and standard internal trigger disk. It is also possible to extend the sensitivity of these systems by fitting a throttle position sensor. By detecting how far open the throttle is the system can then adjust the ignition timing for engine load as well as engine speed giving a 3D ignition map.

In either case the ECU connects to the coil, crank sensor, etc, via a purpose built engine bay wiring loom. This same wiring loom provides outputs for a tachometer drive as well as to control a gear shift light.

A 3D ignition map can adjust ignition timing for engine load as well as engine speed



## ENGINE MANAGEMENT – FUEL INJECTION

The standard engine management system is very good for controlling emissions and giving good fuel economy however as soon as an engine is modified the standard settings are no longer of any use. For very light modifications the standard system can be 'chipped' but even then it is seldom ideal.

For a fuel-injected engine our preferred engine management system is again from DTA. The controlling inputs are crank speed and throttle position, making both ignition timing and fuelling sensitive to engine speed and load. The systems also compensate for air and water temperature to improve cold start and warm up conditions.

To make precise engine mapping easier the DTA systems also have the facility to use an exhaust gas oxygen sensor (commonly called a Lambda sensor).

When we supply a DTA system as part of an 'off the shelf' kit then we have to exercise caution with the engine maps. A DTA ECU supplied as part of a kit will therefore have slightly rich fuelling and slightly retarded ignition. By contrast systems supplied as part of a complete engine build are always mapped on our dyno facility and will have settings that precisely match the engine's requirements. In general the more highly tuned an engine is the more individual its requirements will be and therefore the more important it is to have the engine specifically mapped.

### QED MotorSport Ltd

All prices are quoted in pounds sterling and do not include carriage or VAT

Tel: (+44) 01509 412317 Fax: (+44) 01509 416555

Order online: <http://qedmotorsport.co.uk>



# VAUXHALL XE 2L 16V DOHC

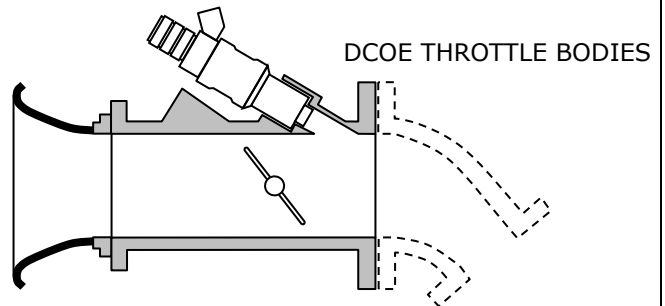
## FUEL INJECTION

The most limiting factor on a standard engine is the inlet manifold/plenum/throttle body arrangement. This restricts the breathing ability of the engine considerably, hence the reason that good old side draught carbs appear to give such an improvement in performance: one tract, one butterfly per cylinder gives optimum cylinder charge filling.

The same concept using injectors gives even more scope for the engine tuner because the quantity of fuel being delivered can now be precisely controlled. We offer many types of throttle body, the most popular types being described below.

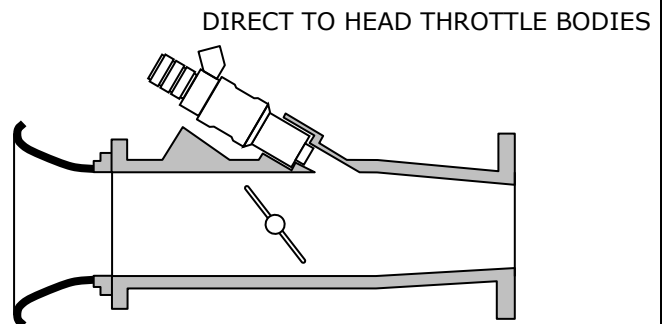
### **DCOE FLANGED TYPE.**

This type of throttle body features the same dimensional package as a side draught carburettor and will fit on to any manifold design for the same. Usually supplied with a 45mm bore these bodies are also available in a 48mm bore size and in either case can be supplied with an integral air bleed screw to make idle speed easier to control.



### **DIRECT TO HEAD**

The ultimate in throttle body evolution, our own QED direct fitment unit requires no manifold in that it fits direct to the head. As well as making the throttle bodies easier to fit the direct to head design is also lighter. Available with a 45mm parallel bore to the butterfly and a taper up to the inlet port. Versions are available to take single or double injectors. An integral air bleed screw makes idle speed easier to control.



There are obviously many other designs of throttle body. However we have carried out extensive dyno testing to arrive at the best possible solution combining simplicity and effectiveness in a compact lightweight package.

## **QED MotorSport Ltd**

All prices are quoted in pounds sterling and do not include carriage or VAT

Tel: (+44) 01509 412317 Fax: (+44) 01509 416555

**Order online: <http://qedmotorsport.co.uk>**

# Vauxhall XE (C20XE) Components Listing

<b>Camshafts and Followers</b>			
Q42H - A hydraulic profile, inlet/exhaust camshaft			
Inlet	201002	(each)	
Exhaust	201001	(each)	£235.00
Q38H - A hydraulic profile, inlet/exhaust camshaft			
Inlet	201006	(each)	£235.00
Exhaust	201005	(each)	£235.00
Q420 - A mechanical profile, inlet/exhaust camshaft			
Inlet	201008	(each)	£235.00
Exhaust	201007	(each)	£235.00
Q450- A mechanical profile, inlet/exhaust camshaft			
Inlet	201010	(each)	£235.00
Exhaust	201009	(each)	£235.00
Q450V - A mechanical profile, inlet/exhaust camshaft			
Inlet	201013	(each)	£235.00
Exhaust	201012	(each)	£235.00
Q42H camshaft, re-profiled on customer	201022	(pair)	£260.00
Q38H camshaft, re-profiled on customer	201026	(pair)	£260.00
Q420 camshaft, re-profiled on customer	201028	(pair)	£260.00
Camshaft dowel	201040	(each)	£2.50
Camshaft rear ball	201050	(each)	£0.65
Cam follower, standard, not OE, early/late type			
Early type	201053	(each)	£14.00
Late type	201052	(each)	£24.10
Cam follower, steel	201054	(each)	£23.00
Cam follower solid insert mod	201056	(each)	£6.00
Top hat shims, for use with non-hydraulic followers, various sizes			
0.075"	201239E	(each)	£2.50
0.080"	201240	(each)	£2.50
0.085"	201240E	(each)	£2.50
0.090"	201241	(each)	£2.50
0.100"	201242	(each)	£2.50
0.110"	201243	(each)	£2.50
0.120"	201244	(each)	£2.50
0.130"	201245	(each)	£2.50
0.140"	201246	(each)	£2.50
0.150"	201247	(each)	£2.50
0.155"	201247E	(each)	£2.50
0.160"	201248	(each)	£2.50
0.165"	201248E	(each)	£2.50
0.170"	201249	(each)	£2.50
0.175"	201249E	(each)	£2.50
0.180"	201250	(each)	£2.50

<b>Cylinder Block Components</b>			
Main cap bolt	204003	(each)	£2.95
Main cap stud and nut set	204004	(set)	£142.50
Main bearing, not OE, various sizes			
Standard	204012	(set)	£57.50
+0.25mm	204016	(set)	£60.00
+0.50mm	204019	(set)	£60.00
Block to head dowel	204030	(each)	£3.00
Water pump, non OE, early/late type			
Early	204042	(each)	£47.50
Late	204046	(each)	£47.50
Water pump bolt	204048	(each)	£3.20
Block core plug, small/large			
Small	204052	(each)	£2.00
Large	204050	(each)	£2.40
Block oil way bung	204054	(each)	£2.25
Block breather blanking plate	204056	(each)	£6.50
Block to gearbox dowel	204057	(each)	£5.25
Block to oil pump dowel	204058	(each)	£1.95



# Vauxhall XE (C20XE) Components Listing

<b>Cylinder Head Components</b>			
Cam cover breather bung	203029	(each)	£9.50
Oil filler cap	203030	(each)	£6.25
Oil filler cap seal	203031	(each)	£2.15
Cam cap nuts	203042	(each)	£0.10
Exhaust cam rear plug	203050	(each)	£8.25
Head bolts, early/late type			
Early (male head)	203060	(each)	£2.20
Late (female head)	203062	(each)	£2.25
Head studs and nuts, ARP	203063	(set)	£165.00
Head bolt washers, early type head bolts	203065	(each)	£1.30
Head to inlet/exhaust manifold stud	203066	(each)	£1.50
Head core plug, large/small			
Large (19x6mm)	203070	(each)	£1.20
Small (18x6mm)	203071	(each)	£1.20
Head oil way bung	203075	(each)	£1.70
Thermostat and Housing	203080	(each)	£22.50

<b>Valve Train</b>			
Inlet/Exhaust valve, standard, not OE			
Inlet	202001	(each)	£7.50
Exhaust	202011	(each)	£13.50
Inlet/Exhaust valve, standard size, QED Hi-Flow (33/29mm)			
Inlet (33mm)	202002	(each)	£16.50
Exhaust (29mm)	202012	(each)	£16.50
Inlet/Exhaust valve, +1mm head diameter, QED Hi-Flow (34/30mm)			
Inlet (34mm)	202003	(each)	£16.50
Exhaust (30mm)	202013	(each)	£16.50
Valve stem seals	211042	(set)	£24.00
Valve guide, colsibro, GM/Coscast head, standard/oversize			
For GM head (11mm OD)	202020	(each)	£8.00
For GM head (+0.002" oversize)	202021	(each)	£8.50
For Coscast head (13mm OD)	202025	(each)	£8.00
For Coscast head (+0.002" oversize)	202026	(each)	£8.50
For GM head (5mm valves / 11mm OD)	202022	(each)	£9.00
Valve springs, standard, OE, early/late type			
Early	202031	(each)	£9.35
Late	202032	(each)	£9.60
Valve spring, race, double			
Standard	202035	(each)	£8.50
Hard	202035H	(each)	£8.50
Valve spring platform, standard, OE, early/late type			
Early	102046	(each)	£1.75
Late	202041	(each)	£2.60
Valve collet, standard, OE	202048	(each)	£1.15
Valve spring retainer, standard, OE	202050	(each)	£6.25
Valve spring retainer, titanium	202051	(each)	£14.50
Inlet/Exhaust valve, +2mm head diameter, QED Hi-Flow (35/31mm)			
Inlet (35mm)	202004	(each)	£17.50
Exhaust (31mm)	202014	(each)	£17.50
Valve spring retainer, steel, for race springs	202052	(each)	£7.00

## QED Motorsport Ltd

Order online @ [qedmotorsport.co.uk](http://qedmotorsport.co.uk)  
 Tel: +44 (0) 1509 412317 | Fax: +44 (0) 1509 416555  
 All prices are quoted in pounds sterling and do not include carriage or VAT

# Vauxhall XE (C20XE) Components Listing

<b>Belt Train</b>			
Camshaft pulley bolt	209002	(each)	£2.05
Camshaft pulley washer	209003	(each)	£4.25
Vernier cam pulleys, QED			
Up to #14142838	209004	(pair)	£160.00
From #14142839	209104	(pair)	£160.00
Toothed crank pulley, for cam belt, early/late			
Early round tooth (Up to engine #14142838)	209009	(each)	£89.50
Late square tooth (From engine #14142839)	209109	(each)	£86.50
Cam belt, early (round tooth), OE/Not OE (up to engine #14142838)			
OE	209010	(each)	£41.50
Not OE	209011	(each)	£26.00
Cam belt, late (square tooth), OE/Not OE (from engine #14142839)			
OE	209110	(each)	£33.10
Not OE	209111	(each)	£18.50
Cam belt idler pulley, steel, for early (round tooth) belts	209020	(each)	£109.00
Cam belt idler pulley, plastic, for late (square tooth) belts, 52.5/62.7mm			
52.5mm	209120	(each)	£22.75
62.7mm	209121	(each)	£16.30
Cam belt tensioner pulley/roller			
For early round tooth belts (Up to engine #14142838)	209021	(each)	£116.00
For late square tooth belts (From engine #14142839)	209124	(each)	£39.60
Tensioner spring	209022	(each)	£3.25
Timing belt kit			
Early round tooth (Up to engine #14142838)	209015	(each)	£121.00
Late square tooth (From engine #14142839)	209115	(each)	£115.00
Timing Disc	109004	(each)	£6.00

<b>Crankshafts and Con Rods</b>			
Crank spigot bearing for Ford gearbox	106080	(each)	£6.00
Crankshaft, steel EN40B	206004	(each)	£1,300.00
Crankshaft, 94mm stroke, steel EN40B	206006	(each)	£1,350.00
Crank pulley, for V belt, alloy	206021	(each)	£55.00
Crank pulley thrust ring	206022	(each)	£51.00
Crank pulley bolt	206024	(each)	£16.95
Crank pulley washer	206025	(each)	£10.55
Crank sensor disc screw	206027	(each)	£0.90
Con rod, forged steel, various types			
Standard small end and length	206032F	(each)	£156.25
For 94mm crank (20mm small end)	206036	(each)	£187.50
End bearings, not OE, various sizes			
Standard	206042	(set)	£40.00
+0.25mm	206044	(set)	£42.50
+0.50mm	206046	(set)	£42.50
Con Rod bolt, standard/race spec (for standard con rods)			
Standard (GM)	206050	(each)	£4.75
Race spec (ARP for std rods)	206051	(each)	£10.50
End Bearings, Mahle Motorsport, Std/+0.25mm			
Std	206043	(set)	£135.00
+0.25mm	206045	(set)	£135.00
Crank pulley, toothed, small diameter, Poly-V (4V)	206018	(each)	£60.00
Crank sensor bracket, for toothed crank pulley (206018)	206019	(each)	£40.00
Con rod bolt, for steel rods	106051	(each)	£10.25

## QED Motorsport Ltd

Order online @ [qedmotorsport.co.uk](http://qedmotorsport.co.uk)  
 Tel: +44 (0) 1509 412317 | Fax: +44 (0) 1509 416555  
 All prices are quoted in pounds sterling and do not include carriage or VAT

# Vauxhall XE (C20XE) Components Listing

<b>Pistons</b>			
Standard size, standard piston	205002	(each)	£90.00
Forged pistons, Omega, race, various sizes			
86mm	205012	(each)	£100.00
86.25mm	205022	(each)	£100.00
86.5mm	205032	(each)	£100.00
Forged pistons, Accralite, flat top, various sizes			
86mm	205011A	(each)	£100.00
86.25mm	205021A	(each)	£100.00
86.5mm	205031A	(each)	£100.00
87mm	205041A	(each)	£100.00
87.5mm	205045	(each)	£100.00
88mm	205047	(each)	£100.00
Forged pistons, Accralite, slipper, 88mm, 20mm pin	205049A	(each)	£140.00
Standard piston ring circlip	205009	(each)	£1.20
Gudgeon pin circlip, Omega	205150	(each)	£2.25
Piston ring set, standard, not OE (for 1 piston)	205103	(set)	£22.50
Piston ring set, +0.50mm, not OE (engine set)	205113	(set)	£77.50
Piston ring set, Omega, various sizes (for 1 piston)			
86mm	205201	(set)	£22.50
86.25mm	205203	(set)	£22.50
86.5mm	205204	(set)	£22.50
87mm	205205	(set)	£22.50
Piston ring set, Accralite, various sizes (for 1 piston)			
86mm	205201A	(set)	£22.50
86.25mm	205203A	(set)	£22.50
86.5mm	205204A	(set)	£22.50
87mm	205205A	(set)	£22.50
87.5mm	205206	(set)	£22.50
88mm	205207	(set)	£22.50
87.5mm Slipper Piston (8053ZT - Pick-Ups)	205210	(set)	£25.00
Gudgeon pin circlip, Accralite	205151	(each)	£2.25
Forged pistons, Accralite, race top, various sizes			
86mm	205012A	(each)	£100.00
86.25mm	205022A	(each)	£100.00
86.5mm	205032A	(each)	£100.00
87mm	205042A	(each)	£100.00
87.5mm	205046	(each)	£100.00
88mm	205048	(each)	£100.00
Omega piston, 90mm, Race Top	205050	(each)	£150.00
Omega 86.25 Piston, Std Pattern	205020	(each)	£100.00
Mahle, 86.5mm, Std Piston	205003	(each)	£90.00

<b>Flywheels</b>			
Flywheel, steel, standard/with trigger teeth			
Standard pattern	207001	(each)	£260.00
With trigger teeth	207002	(each)	£290.00
Flywheel, ultralight, steel, various types			
7 1/4" (184mm) clutch	207005	(each)	£260.00
7 1/4" (184mm) clutch (with trigger teeth)	207006	(each)	£300.00
5 1/2" (140mm) clutch (no ring gear)	207008	(each)	£130.00
5 1/2" (140mm) clutch with trigger teeth (no ring gear)	207007	(each)	£175.00
Flywheel bolts	207030	(each)	£1.70
Flywheel/clutch bolts	207031	(each)	£1.30
Flywheel bolt, ARP	207035	(each)	£6.50
Flywheel/clutch bolts, for twin plate clutch	207032	(set)	£5.00

## QED Motorsport Ltd

Order online @ [qedmotorsport.co.uk](http://qedmotorsport.co.uk)  
 Tel: +44 (0) 1509 412317 | Fax: +44 (0) 1509 416555  
 All prices are quoted in pounds sterling and do not include carriage or VAT

# Vauxhall XE (C20XE) Components Listing

<b>Clutch</b>			
Clutch plate, 228mm, 1" x 23 spline (Ford box), Heavy Duty, Organic, Helix	208004	(each)	£160.65
Clutch cover, standard pattern, fast road/competition, Helix			
Fast Road (for flat flywheel)	208013	(each)	£169.63
Competition (for flat flywheel)	208014	(each)	£202.28
Fast Road (for later pot flywheel)	208015	(each)	£169.63
Competition (for later pot flywheel)	208016	(each)	£216.87
Sintered clutch plate, for 7.25" (184mm) twin plate assembly, 1"x23	108016	(each)	£72.73
Clutch plate, 228mm, cerametallic, 4 paddle, Helix, various types			
1" x 23 spline	208020	(each)	£195.57
7/8" x 20 spline	208022	(each)	£195.57
Standard centre (20.4mm x 24 spline)	208024	(each)	£195.57
Manta	208026	(each)	£195.57
Twin plate clutch assembly, 7 1/4" (184mm)			
For sintered plates	108030	(each)	£401.82
For cerametallic plates	108030a	(each)	£485.16

<b>Lubrication</b>			
Standard filter adaptor	210004	(each)	£9.90
Oil filter, short	210002	(each)	£7.50
Short filter adaptor	210005	(each)	£6.50
Oil pressure switch	210110	(each)	£9.55
Oil pressure relief valve spring	210111	(each)	£1.85
Oil pump, not OE, early/late type			
Early	210116	(each)	£90.00
Late	210115	(each)	£90.00
Oil pump annulus	210117	(each)	£37.10
Oil pump inner gear, steel, for comp use	210119	(each)	£105.00
Cast shallow wet sump pan	210130	(each)	£155.00
Oil Pick up pipe, for shallow wet sump	210132	(each)	£29.00
Cast shallow wet sump baffle	210131	(each)	£24.00
Sump bung	210128	(each)	£4.75
Sump bung seal	210129	(each)	£0.40
Cast alloy dry sump pan, QED, with fittings	210216	(each)	£487.00
3 stage scavenger/pressure dry sump pump	210210	(each)	£645.00
Oil pick up adaptor kit, for 2 stage pump	210213	(each)	£30.95
Dry sump kit, QED, heavy duty, cast sump pan	210200	(each)	£995.00
Dry sump kit, 2 stage pump	210201	(each)	£915.00
Dry sump kit, QED, raised bracket	210202	(each)	£995.00
Series 2 GM 14 tooth crank pulley	210220	(each)	£36.50
Front pulley mounting boss	210221	(each)	£42.50
Dry sump oil tank, small push on unions	110040	(each)	£168.00
Oil cooler, 10/13/19 row			
10 Row	110050	(each)	£63.50
13 Row	110051	(each)	£79.50
19 Row	110052	(each)	£100.00
Millers CFS, 10W/40	702013	(5L)	£45.25
Millers CRX synthetic gear oil, 75W/90, 5L	702015	(each)	£54.00
Millers CRX LS synthetic gear oil, 75W/90 (for LSD), 1L	702018	(each)	£12.00
Oil Pick Up Pipe, Standard	210120	(each)	£81.00
Dry Sump Front Cover	210214	(each)	£107.00
Dry Sump Pump Pulley 28T	210223	(each)	£48.50
Millers CRX synthetic gear oil, 75W/90, 1L	702016	(each)	£10.50
Millers CRX LS synthetic gear oil, 75W/90 (for LSD), 5L	702017	(each)	£62.00
Oil Pump Belt, various types			
187L 050	210231	(each)	£11.50
210L 050	210232	(each)	£11.50
210L 100	210232W	(each)	£11.50
225L 050	210233	(each)	£11.50
225L 075	210234	(each)	£11.50
255L 050	210236	(each)	£11.50

## QED Motorsport Ltd

Order online @ [qedmotorsport.co.uk](http://qedmotorsport.co.uk)  
 Tel: +44 (0) 1509 412317 | Fax: +44 (0) 1509 416555  
 All prices are quoted in pounds sterling and do not include carriage or VAT

# Vauxhall XE (C20XE) Components Listing

<b>Ignition</b>			
Distributor blanking plate	203051	(each)	£10.50
Spark plug, various types			
Standard	213001	(each)	£4.00
Fast road	213002	(each)	£4.50
Plug leads, competition, for engines with/without distributor			
Engines with distributor	213017	(set)	£121.00
Engines without distributor	213018	(set)	£110.00
Plug leads, extra long (+12 inches)	213019	(set)	£122.00
Twin coil unit	214111	(each)	£78.50

<b>Fuel Injection</b>			
Fuel pump, Bosch	214164	(each)	£85.00
Fuel filter	214168	(each)	£11.50
Fuel filter, bullet, - 6	214169	(each)	£49.50
Aeroquip fuel line, - 6 / - 4			
- 6	214070	(metre)	£15.00
- 4	214071	(metre)	£15.00
Hose end finisher, - 6 / -4, red/blue			
- 6 (red)	214174	(each)	£5.50
- 6 (blue)	214175	(each)	£5.50
- 4 (red)	214176	(each)	£3.10
High pressure rubber fuel line, 1/4" or 5/16"			
1/4"	214172	(metre)	£13.25
5/16"	214173	(metre)	£14.00
Fuel pressure regulator, various types			
Fast road (8mm push on)	214115	(each)	£78.13
Fast road (-6 fittings)	214115A	(each)	£84.25
Race (8mm push on)	214115B	(each)	£95.26
Race (-6 fittings)	214115C	(each)	£98.66
Injector, race, Bosch 803 (381cc @ 3bar)	214152	(each)	£106.00
Injector, pico 330, Weber	214154	(each)	£75.00
Throttle bodies, 45mm, QED/Jenvey direct to head, single/double injector			
Single Injector	214130	(pair)	£475.00
Twin Injector	214132	(pair)	£500.00
Jenvey throttle bodies, fit DCOE manifold, with idle air bleed screw, 45/48mm			
45mm	214136	(pair)	£405.00
48mm	214137	(pair)	£405.00
Throttle cable kit, QED/Jenvey bodies, single/double cable			
Single cable	214181	(each)	£92.00
Double cable	214182	(each)	£130.00
Mounting bracket, O/H cable, engine end	214187	(each)	£17.00
Mounting bracket, U/S cable, engine end	214188	(each)	£17.00
Mounting bracket, U/S cable, intake end	214189	(each)	£17.00
Air trumpets, 45/48mm bore, 40/60/90/120mm length			
45mm x 40mm	214141	(each)	£23.00
45mm x 60mm	214141A	(each)	£26.00
45mm x 90mm	214142	(each)	£26.00
45mm x 120mm	214142A	(each)	£30.00
48mm x 40mm	214143A	(each)	£26.00
48mm x 90mm	214143	(each)	£26.00
48mm x 120mm	214144	(each)	£30.00
Swirl / Collector Pot	214177	(each)	£145.00

## QED Motorsport Ltd

Order online @ [qedmotorsport.co.uk](http://qedmotorsport.co.uk)

Tel: +44 (0) 1509 412317 | Fax: +44 (0) 1509 416555

All prices are quoted in pounds sterling and do not include carriage or VAT

# Vauxhall XE (C20XE) Components Listing

<b>Inlet Manifolds and Carburettors</b>			
Inlet manifold, dry/with water rail, upright/7Å° engine			
Upright Engine (Dry)	217003	(each)	£173.00
Upright Engine (With water rail)	217004	(each)	£203.00
7Å° Engine (Dry)	217005	(each)	£173.00
7Å° Engine (With water rail)	217006	(each)	£138.50
Inlet manifold/carburettor stud	217010	(each)	£0.50
Air filter backplate, for Caterham manifold	217025	(each)	£28.70
8mm K nut, for inlet and exhaust manifold studs	217013	(each)	£2.20
Weber twin cable throttle linkage assembly	217100	(each)	£72.50
Carb O ring and spacer combined	117010	(each)	£2.70
Carb Thackery washer	117017	(each)	£0.20
Carb rubber (1 bush, 2 cups)	117018	(each)	£1.25

<b>Engine Management</b>			
Ignition management ECU, DTA S40i	214023	(each)	£350.00
Full engine management ECU, DTA, S40/S60/S80			
S40	214021	(each)	£495.00
S60	214027	(each)	£750.00
S80	214025	(each)	£850.00
Ignition management wiring loom, DTA			
Vauxhall crank sensor	214105	(each)	£175.00
Ford crank sensor	214104	(each)	£175.00
Full engine management wiring loom, DTA S40/S60/S80/S100			
S40	214083	(each)	£360.00
S60/S80/S100	214065	(each)	£410.00
Air temperature sensor	214116	(each)	£17.50
Manifold air pressure sensor, 1.1/3.0 bar			
1.1 Bar (Barometric)	214117	(each)	£80.00
3.0 Bar (Turbo)	214117A	(each)	£80.00
Water temperature sensor	214118	(each)	£15.50
Throttle position sensor, for throttle bodies/weber 40/45/48 DCOE carbs			
Throttle bodies	214119	(each)	£52.50
40/45 DCOE Weber carbs	214125	(each)	£56.25
48 DCOE Weber carbs	214126	(each)	£59.25
Crank speed sensor, standard/Ford type			
Standard	214121	(each)	£47.50
Ford	214123	(each)	£49.80
Crank speed sensor trigger disk, fixes to front pulley, 100/138mm			
100mm	214124S	(each)	£55.00
138mm	214124	(each)	£55.00
Comms lead, DTA	214109	(each)	£45.00

## QED Motorsport Ltd

Order online @ [qedmotorsport.co.uk](http://qedmotorsport.co.uk)  
 Tel: +44 (0) 1509 412317 | Fax: +44 (0) 1509 416555  
 All prices are quoted in pounds sterling and do not include carriage or VAT

# Vauxhall XE (C20XE) Components Listing

<b>Gaskets</b>			
Head gasket set- QED no head gasket	211002	(set)	£42.50
Head set, complete, Elring	211003	(each)	£60.00
Bottom gasket set	211010	(set)	£62.50
Head gasket	211006	(each)	£22.00
Head gasket, multi-layer steel, 88mm, 0.051" / 0.070"			
0.051"	211008	(each)	£89.00
0.070"	211008B	(each)	£105.00
Cam cover gasket	211015	(each)	£32.50
Exhaust manifold gasket	211018	(each)	£13.50
Inlet manifold gasket	211020	(each)	£5.00
Camshaft seal	211022	(each)	£10.50
Thermostat O ring	211025	(each)	£1.75
Thermostat housing/head O ring	211026	(each)	£4.95
Crank/breather tube gasket	211027	(each)	£1.40
Oil pump gasket	211028	(each)	£4.60
Sump gasket	211029	(each)	£14.50
Front oil seal	211031	(each)	£17.50
Rear oil seal	211033	(each)	£20.00
Water pump O ring	211035	(each)	£3.00
Oil pick up pipe O ring	211038	(each)	£0.25
Distributor body O ring	211036	(each)	£0.45
Distributor drive shaft O ring	211037	(each)	£0.15

<b>Miscellaneous</b>			
Blue hylomar	710013	(each)	£3.50
Clutch release bearing, Type 9 gearbox	218014	(each)	£26.51
Clutch release fork	218012	(each)	£47.50
Bellhousing, 5 speed, for upright engine, short/long, Type 9 / E (Rocket)			
Short (e.g. 4-cylinder Sierra)	218001	(each)	£266.50
Long (e.g. V6 Sierra)	218002	(each)	£258.00
Bellhousing, 5 speed, 2000E/bullet, for upright engine	218005	(each)	£155.00
Fulcrum pin	218010	(each)	£22.25
Coaxial clutch cylinder	218020	(each)	£101.95
Coaxial release bearing	218022	(each)	£27.50
2000E/Bullet co-axial clutch cylinder mounting adaptor	218023	(each)	£48.84
Coaxial adaptor, rocket, 4 speed	218024	(each)	£42.00
Coaxial adaptor, Sierra 5 speed	218025	(each)	£59.50
Engine flush	710012	(300ml)	£4.00
Millers Rad Hib Extracool	702103	(1L)	£21.50
Crackle/Wrinkle finish paint, VHT, black, aerosol	710001	(400ml)	£8.45
Grey engine paint, tin	710002	(250ml)	£8.00
Engine preservative, pumpasol	710011	(130ml)	£3.00
Coaxial Clutch Spacer			
1/8"	218026	(each)	£16.90
1/4"	218027	(each)	£25.00
1/2"	218029	(each)	£25.00
3/4"	218030	(each)	£25.00
1"	218031	(each)	£25.00
30mm	218028	(each)	£29.75

## QED Motorsport Ltd

Order online @ [qedmotorsport.co.uk](http://qedmotorsport.co.uk)

Tel: +44 (0) 1509 412317 | Fax: +44 (0) 1509 416555

All prices are quoted in pounds sterling and do not include carriage or VAT



# Vauxhall XE (C20XE) Components Listing

<b>Weber Carburettors</b>			
<b>Carbs, 40/45 DCOE</b>			
40mm	116000	(pair)	£625.00
45mm	116001	(pair)	£625.00
<b>Trumpet, alloy, various sizes</b>			
40mm x 16mm	116011	(each)	£17.95
40mm x 26mm	116013	(each)	£17.95
40mm x 39mm	116015	(each)	£19.75
45mm x 16mm	116021	(each)	£18.95
45mm x 26mm	116023	(each)	£18.95
45mm x 39mm	116025	(each)	£18.95
<b>Trumpet locktab, 40/45mm</b>			
40mm	116019	(each)	£1.50
45mm	116029	(each)	£1.70
<b>Banjo bolt</b>			
	116030	(each)	£13.10
<b>Banjo union, single/double</b>			
Single	116031	(each)	£12.45
Double	116032	(each)	£16.95
<b>Banjo washer, inner/outer</b>			
Inner	116035	(each)	£0.50
Outer	116036	(each)	£0.50
<b>Spindle return spring</b>			
	116045	(each)	£3.25
<b>Linkage return spring</b>			
	116046	(each)	£5.75
<b>Jet cover</b>			
	116048	(each)	£9.30
<b>Jet cover gasket</b>			
	116049	(each)	£0.80
<b>Overhaul kit, per carb</b>			
	116050	(each)	£18.50
<b>Gasket kit, per carb</b>			
	116051	(each)	£10.05
<b>Float chamber gasket</b>			
	116053	(each)	£6.40
<b>Front lever</b>			
	116055	(each)	£12.85
<b>Float valve, various sizes</b>			
150	116060	(each)	£7.95
175	116061	(each)	£7.95
200	116062	(each)	£7.95
300	116065	(each)	£7.95
<b>Float</b>			
	116068	(each)	£17.95
<b>Choke, 40/45mm</b>			
40mm x 30mm - 40 x 36 (order by size, eg choke, <b>40mm x 31mm – 116071</b> )			
45mm x 34mm - 45 x 39 (order by size, eg choke, <b>45mm x 36mm – 116086</b> )		(from)	£10.80
45mm x 40mm (116090)			
<b>Choke screw locktab</b>			
	116078	(each)	£3.37
<b>Venturi, 40/45mm</b>			
40mm	116092	(each)	£18.50
45mm	116093	(each)	£18.50
<b>Main jet, various sizes</b>			
100, 105, 110 [...] 235, 240 (order by size eg main jet, <b>160 - 116160</b> )		(from)	£4.25
<b>Air corrector, various sizes</b>			
100, 105, 110 [...] 190, 195 (order by size eg air corrector, <b>140 – 116340</b> )		(from)	£2.45
200, 205, 210 [...] 275, 280 (order by size eg air corrector, <b>210 – 116410</b> )			
<b>Emulsion tube, various sizes</b>			
F2 - F16 (order by size, eg emulsion tube, <b>F9 – 116509</b> )		(from)	£14.95
<b>Spindle, 40/45 DCOE</b>			
40	116550	(each)	£21.85
45	116551	(each)	£32.45
<b>Butterfly, 40/45mm</b>			
40mm	116555	(each)	£4.90
45mm	116556	(each)	£6.90
<b>Idle jet, various types</b>			
40F6	116605	(each)	£2.85
45F6	116606	(each)	£2.85
50F6	116607	(each)	£2.85
55F6	116608	(each)	£2.85
40F8	116610	(each)	£2.85
45F8	116611	(each)	£2.85
50F8	116612	(each)	£2.85
55F8	116613	(each)	£2.85
60F8	116614	(each)	£2.85
40F9	116620	(each)	£2.85
45F9	116621	(each)	£2.85
50F9	116622	(each)	£2.85
55F9	116623	(each)	£2.85
60F9	116624	(each)	£2.85
65F9	116625	(each)	£2.85
70F9	116626	(each)	£2.85

**QED Motorsport Ltd**

Order online @ [qedmotorsport.co.uk](http://qedmotorsport.co.uk)

Tel: +44 (0) 1509 412317 | Fax: +44 (0) 1509 416555

All prices are quoted in pounds sterling and do not include carriage or VAT

# Vauxhall XE (C20XE) Components Listing

Pump jet, various sizes			
30	116700	(each)	£6.55
35	116701	(each)	£6.55
40	116702	(each)	£6.55
45	116703	(each)	£6.55
50	116704	(each)	£6.55
55	116705	(each)	£6.55
60	116706	(each)	£6.55
65	116707	(each)	£6.55

## Air Filters

Air filter, single piece, standard type, 65-160mm deep			
65mm deep	910002	(each)	£75.00
100mm deep	910003	(each)	£75.00
120mm deep	910004	(each)	£75.00
140mm deep	910005	(each)	£80.00
160mm deep	910006	(each)	£85.00
Air filter, single piece, sausage type, 65-160mm deep			
65mm deep	910010	(each)	£97.00
100mm deep	910011	(each)	£97.00
120mm deep	910012	(each)	£97.00
140mm deep	910013	(each)	£102.00
160mm deep	910014	(each)	£107.00
ITG air filter backplate for QED-Jenvey DTH throttle bodies	217020	(each)	£26.00
ITG air filter backplate for DCOE carbs / throttle bodies (Titan Manifold)	217023	(each)	£26.00

## Specials

Motorsport Engine Upgrade Kits			
Q42H/C		(each)	£1,875.00
Q42H/I		(each)	£1,895.00
Q38H/C		(each)	£2,395.00
Q38H/I		(each)	£2,450.00
Q420/C		(each)	£2,695.00
Q420/I		(each)	£2,775.00
Q450V/C		(each)	£2,895.00
Q450V/I		(each)	£2,995.00
Throttle body management kit (distributorless)	xe	(each)	£1,595.00

### QED Motorsport Ltd

Order online @ [qedmotorsport.co.uk](http://qedmotorsport.co.uk)

Tel: +44 (0) 1509 412317 | Fax: +44 (0) 1509 416555

All prices are quoted in pounds sterling and do not include carriage or VAT

# VAUXHALL XE 2L 16V DOHC

## Induction Systems

As is well documented, the major limiting factor to the output of these engines in their standard guise is the somewhat restrictive inlet manifold/throttle body arrangement.

Replacing this with a purpose made, single, butterfly controlled, barrel per cylinder is the obvious way to go.

Presented in the simplest form, we find twin side draught carbs on a purpose made manifold. The next step is to replace the carbs with similarly flanged throttle bodies carrying injectors. Logical progression from this point is a direct to head throttle body. This, correctly designed, offers optimum airflow, greater simplicity and less weight than any other system.

Slide throttles, taper throttles and roller throttles are all available for these engines, but none of them offer any further worthwhile performance gains especially considering the cost.

We have carried out extensive back to back dyno testing with the taper system versus our own parallel bodies and we find no difference anywhere in the power range. Considering the complexity of tapered systems, the simple body is generally the one to use.



## THROTTLE BODY MANAGEMENT KIT

We now offer a management kit that makes use of direct to head throttle bodies and the DTA engine management system. Designed with simplicity as well as effect in mind the TBM/DL kit allows any competent engine builder an affordable means to release the potential of this engine using a state of the art induction package.

Pair of direct fitment, QED 45mm throttle bodies with air trumpets, fuel rail and pressure regulator, throttle potentiometer, and air temp sensor.

DTA full management ECU with appropriate fuel and ignition configuration (according to customer spec), two stage rev limiter and the facility for shift light and fuel pump controls.

DTA engine management software and comprehensive manual.

Competition engine wiring loom.

Twin coil and distributor blanking plate.

**£1540.00 + VAT**



## QED MotorSport Ltd

All prices are quoted in pounds sterling and do not include carriage or VAT

Tel: +44/0 1509 412317 Fax: +44/0 1509 416555

**Order online: <http://qedmotorsport.co.uk>**

# VAUXHALL XE 2L 16V DOHC

## MOTORSPORT ENGINE UPGRADE KITS

All of the kits listed below have been developed for motorsport use. They therefore include a motorsport induction system (see below) and an appropriate DTA engine management system. Ignition is distributorless using a wasted spark twin coil system. The kits include the necessary components to blank off the original distributor.

### Carb kits (suffix C)

All carb kits include a pair of Weber 45 DCOW side draught carbs. Suitable jets and chokes are fitted and the kit includes air trumpets and linkages.

Also included are a cast aluminium inlet manifold and a carb fitting kit (which includes studs, O ring plates, double coil spring washers and nyloc nuts).

A DTA ignition management ECU controls ignition timing and has a two-stage rev limiter, tacho output and shift light control. The ECU is supplied with a wiring loom to connect to the engine.

### Injection kits (suffix I)

All injection kits include a pair of QED 45mm direct to head throttle bodies. These come with air trumpets, fuel rail, fuel pressure regulator, throttle position sensor and air temp sensor.

A DTA full engine management ECU controls ignition timing and fuelling and has a two-stage rev limiter, tacho output, fuel pump control, shift light control, and other user configurable features. The ECU is supplied with a wiring loom to connect to the engine.

### Q42H – 190 to 200BHP

- A pair of exchange Q42H profile camshafts, used on standard timing marks, and with standard hydraulic cam followers.
- A set of race quality rod bolts (for a higher rev limit).

### Q38H – 200 to 210BHP

- A pair of exchange Q38H profile camshafts, used with the standard hydraulic cam followers.
- A pair of vernier cam pulleys.
- A set of forged pistons (with deeper valve pockets to suit the cams).
- A set of race quality rod bolts (for a higher rev limit).



### Q420 – 215 to 220BHP

- A pair of exchange, Q420 profile camshafts (not suitable for the standard hydraulic followers).
- A set of solid cam follower inserts and shims.
- A pair of vernier cam pulleys.
- A set of race quality valve springs (to cope with the higher lift & valve acceleration of the cams).
- A set of forged pistons (with the deeper valve pockets required for this cam profile).
- A set of race quality rod bolts (for a higher rev limit).

### Q450V – 225 to 245BHP

- A pair of new, Q450V profile camshafts on new, OE spec blanks.
- A set of solid cam follower inserts and shims.
- A pair of vernier cam pulleys.
- A set of race quality valve springs
- (to cope with the higher lift & valve acceleration of the cams).
- A set of forged pistons
- (with deeper valve pockets & higher CR required for this cam profile).
- A set of race quality rod bolts (for a higher rev limit).



## Prices

Q42H/C – £1725.00	Q42H/I – £1800.00
Q38H/C – £2225.00	Q38H/I – £2300.00
Q420/C – £2450.00	Q420/I – £2550.00
Q450V/C – £2650.00	Q450V/I – £2750.00

## QED MotorSport Ltd

All prices are quoted in pounds sterling and do not include carriage or VAT

Tel: +44/0 1509 412317 Fax: +44/0 1509 416555

Order online: <http://qedmotorsport.co.uk>