This press pack accompanied the UK launch of VVT-i petrol engines for the revised first generation Avensis in August 2000. The model underwent changes during its time on sale which can be tracked using the Timeline feature on the first generation Avensis archive page. Further assets and information relating to the first generation Avensis can be obtained from the press office.

NEW AVENSIS WITH VVT-i ENGINES

SECTION ONE

AVENSIS GETS NEW RUNNING SHOES FOR SUMMER

You are a teenager. It's the end of school term and a long summer looms ahead. You've got new running shoes. The old favourites, now tatty and worn out, are discarded with nary a second glance and the new ones strapped on. Soft, cool and infeasibly clean, they amaze most in one area: the feeling of renewed power they give your legs, a spring in every step.

In touch with the ground, yet cushioned form the impact; you feel you could run for miles. Each step feels like you are being pushed away from the ground without even trying. Darting around corners and through crowded streets as if you've put new Duracells in your ankles.

Do you remember that feeling? Good, because now you'll understand when we say the Toyota Avensis has got new running shoes for summer.

More precisely, the Avensis – Toyota's UK-built best seller - has got three all new petrol engines and a revised diesel that all use intelligent engineering to bring more power, lower fuel consumption and cleaner emissions. It has also had its chassis settings tweaked to make it more responsive to steering inputs, roll less, yet still keep that class leading refinement for which it is rightly famous.

ADVANCED TECHNOLOGY FOR AVENSIS

- Advance technology VVT-i petrol engines
- Better performance, better fuel consumption, lower emissions
- New direct-injection 2-litre petrol engine
- Improved ride and handling, state of the art common rail Direct Injection Diesel
- Improved quality interior trim

The reinvigorated Avensis now features the very latest high technology engines plus improved interior quality. Allied to improved ride and handling Avensis now offers new levels of refinement, performance and economy in the family and fleet car market.

Available in three body styles; a saloon, liftback or estate, Avensis will be built for the European market at Toyota's Burnaston factory, near Derby, where the company has invested more than £1.5billion in advanced, high quality car manufacturing.

Advanced Engine Technology

All petrol engined models in the Avensis range now benefit from Toyota's advanced Variable Valve Timing-intelligent (VVT-i) technology. As a result the Avensis is now more flexible and easier to drive; offers better performance than comparable cars with the same engine size; uses less fuel and emits less carbon dioxide – a significant factor for a fleet sector car as future company car tax will be based on emissions - less nitrous oxides and less hydrocarbons.

The Avensis sees the launch of a new Toyota, D4 direct injection petrol engine which offers outstanding fuel economy and performance. The 2.0-litre, 147bhp engine offers 17 percent more power and 12.4 percent more torque than the previous 2.0-litre engine and yet is over seven percent more economical on the European combined cycle.

The Avensis 2.0 D4 will accelerate to 62mph in 9.1 seconds and has a top speed of 130mph. The new engine meets European Step 3 emission standards.

Step 4 Emission Achieved

The new 1.8-litre VVT-i engine in the revised Avensis range is the latest version of the unit already fitted to successful new Toyota sports models, such as the Celica and the MR2 Roadster. It complies with European Step 4 emissions legislation.

Power has been raised by 17.2 percent and the new engine develops 127bhp at 6,000 rpm. Maximum torque is up by 9.7 percent to 170Nm at 4,200 rpm. The new Avensis 1.8 VVT-i accelerates to 62mph in 10.0 seconds and has a top speed of 127 mph.

Class Leading

The new 1.6-litre VVT-i Avensis outperforms some 1.8-litre rivals in the class yet still offers better fuel economy. The 1598cc engine delivers 109bhp at 6,000rpm and maximum torque of 150Nm at 3,800rpm. It gives the new Avensis a top speed of 121mph and acceleration to 62mph in 11.3 seconds.

Clean, Quiet Direct Injection Diesel

In the rapidly growing diesel market, the Avensis will outgun the opposition with its 109bhp two litre, D4-D common rail diesel engine that is among the best performing in this class.

The newly developed D4-D diesel technology is the most technically advanced on the market today and answers many of the criticisms leveled at diesel engines in the past. It offers improved performance, reduced emissions, and less noise and vibration.

The new engine consumes around 11 percent less fuel than earlier diesel engines and is one of the few diesel engines currently in the market to comply with European Step 3 emission legislation. The Avensis 2.0 D4-D has a top speed of 121mph and will accelerate to 62mph in 11.4 seconds.

Premium Quality Interior Trim

Improvements to the Avensis range are not confined to the high technology engines. A series of enhancements to the interior trim have resulted in higher quality.

The heating and ventilation controls have been redesigned and the audio system is now integrated into the centre console with a multi-functional display showing audio and vehicle information. Higher grade models will be equipped with remote audio control switches on the steering wheel.

The instrument panel has been redesigned for greater clarity and inserts around detail features such as the air-vents have been improved. Soft touch plastics, leather covers and movement dampers on items such as the glove box cover and ashtray have been installed to add to the high quality feel of the cabin.

Bright Eyes

The new Avensis gets a new look too - with a strong Toyota-family face, jewel effect headlamps and a cleaner, more emphatic front bumper design. There is increased use of chrome in the rear design, new rear combination lamps and a chrome exhaust tailpipe to enhance the sporting character of the car.

Improved Comfort, Handling and Safety

The Toyota Avensis has always benefited from its sophisticated, multi-link rear suspension, which offers class leading balance between stability, ride and handling. Driving dynamics of the new range have been improved still further with European-based engineers and Japanese designers working on improved high speed stability, ride comfort and steering feel.

Attention has been paid to improving both active and passive safety. Anti-lock brakes, with electronic brake force distribution, will be standard on all models with uprated rear disc brakes available on all models.

All Avensis 2.0 D4 models will also be equipped with electronic Vehicle Stability Control (VSC) which helps prevent the car skidding on slippery road surfaces. The VSC system is backed up with traction control and electronic brake assist for more effective braking.

All Avensis models are already equipped with twin front airbags as standard and side airbags as an option. 'Curtain shield' side airbags, which serve to offer even greater protection against head injury by shielding the roof lining, front and centre pillars in the event of a collision are available as an option.

Full European Warranty

The new Avensis will be backed by Toyota's comprehensive peace-of-mind warranty package and comprehensive dealer network across the whole of Europe. Full mechanical warranty is for three years and 60,000 miles (unlimited in the first year) with a three year paintwork warranty and 12-year protection against body perforation.

Prices

The reinvigorated Avensis will be available in 47 different derivatives thanks to the choice of three body styles - saloon, liftback and estate – four engines, two transmissions and six trim levels.

Model				Basic £	VAT £	Retail £	On Road £
S	Saloon / Liftback	1.6 VVT-i	manual	£10,906.38	£1,908.62	£12,815.00	£13,495.00
S	Saloon / Liftback	2.0 D4-D	manual	£12,182.98	£2,132.02	£14,315.00	£14,995.00
S	Estate	2.0 D4-D	manual	£13,034.04	£2,280.96	£15,315.00	£15,995.00
Vermont	Saloon / Liftback	1.6 VVT-i	manual	£10,480.85	£1,834.15	£12,315.00	£12,995.00
Vermont	Liftback	1.8 VVT-i	manual	£10,693.62	£1,871.38	£12,565.00	£13,245.00
Vermont	Liftback	1.8 VVT-i	automatic	£11,493.62	£2,011.38	£13,505.00	£14,185.00
Vermont	Liftback	2.0 D4-D	manual	£11,757.45	£2,057.55	£13,815.00	£14,495.00
Vermont	Estate	1.8 VVT-i	manual	£11,544.68	£2,020.32	£13,565.00	£14,245.00

GS	Saloon / Liftback	1.6 VVT-i	manual	£12,182.98	£2,132.02	£14,315.00	£14,995.00
GS	Saloon / Liftback	1.8 VVT-i	manual	£12,395.74	£2,169.26	£14,565.00	£15,245.00
GS	Saloon / Liftback	1.8 VVT-i	automatic	£13,195.74	£2,309.26	£15,505.00	£16,185.00
GS	Saloon / Liftback	2.0 VVT-i	manual	£12,821.28	£2,243.72	£15,065.00	£15,745.00
GS	Saloon / Liftback	2.0 D4-D	manual	£13,459.57	£2,355.43	£15,815.00	£16,495.00
GS	Estate	1.8 VVT-i	manual	£13,246.81	£2,318.19	£15,565.00	£16,245.00
GS	Estate	2.0 D4-D	manual	£14,310.64	£2,504.36	£16,815.00	£17,495.00
	•					-	
SR	Saloon / Liftback	2.0 VVT-i	manual	£13,885.11	£2,429.89	£16,315.00	£16,995.00
	•						
GLS	Saloon / Liftback	1.8 VVT-i	manual	£13,672.34	£2,392.66	£16,065.00	£16,745.00
GLS	Saloon / Liftback	1.8 VVT-i	automatic	£14,472.34	£2,532.66	£17,005.00	£17,685.00
GLS	Saloon / Liftback	2.0 VVT-i	manual	£14,523.40	£2,541.60	£17,065.00	£17,745.00
GLS	Saloon / Liftback	2.0 D4-D	manual	£14,736.17	£2,578.83	£17,315.00	£17,995.00
GLS	Estate	2.0 VVT-i	manual	£15,374.47	£2,690.53	£18,065.00	£18,745.00
	<u>'</u>						
CDX	Saloon / Liftback	1.8 VVT-i	manual	£15,374.47	£2,690.53	£18,065.00	£18,745.00
CDX	Saloon / Liftback	1.8 VVT-i	automatic	£16,174.47	£2,830.53	£19,005.00	£19,685.00
CDX	Saloon / Liftback	2.0 VVT-i	manual	£16,225.53	£2,839.47	£19,065.00	£19,745.00
CDX	Saloon / Liftback	2.0 D4-D	manual	£16,438.30	£2,876.70	£19,315.00	£19,995.00
CDX	Estate	2.0 VVT-i	manual	£17,076.60	£2,988.40	£20,065.00	£20,745.00

The new cars are available in the UK from 1 August.

SECTION TWO

AVENSIS IN THE UK

The Toyota Avensis was launched to considerable acclaim and has proved a highly desirable contender in the competitive UK upper medium segment, accounting for over 60,000 sales since introduction in January 1998. It provided Toyota with its first truly competitive fleet car and has become a very successful product in that sector.

For the 2001 model year, Avensis receives new VVT-i and direct injection petrol engines, a fresh new look and considerable interior styling changes. The chassis has been re-engineered for a more dynamic and involving driving experience; unique features such as Satellite Navigation and Vehicle Stability Control ensure the new Avensis is now more attractive than ever to the all-important fleet customer.



The best news is that, despite all these improvements, Avensis continues to offer unbeatable value for money. With the increasing awareness and importance of fuel economy and low emission levels, Avensis is not only a great value purchase – it is also inexpensive to own.

New Engines

The most significant feature of the new Avensis is the introduction of three new petrol engines. The Toyota Variable Valve Timing – intelligent (VVT-i) system is introduced to all petrol variants.

The 16 valve 1.6 and 1.8 'lean-burn' engines are replaced by the 1.6 and 1.8 VVT-i units. Both are from the same family as the new Corolla, Celica and MR2 Roadster engines. The installation of the new engines maintains the class leading efficiency of the previous model, however power and torque are significantly improved.

The 2.0 litre petrol engine is replaced by the new Toyota D4 (Direct injection 4-stroke) 2.0 litre petrol engine, also featuring the VVT-i system. The D4 unit was the world's first direct injection petrol engine when it was introduced to the Japanese domestic market in 1996. Now extensively re-worked to take

account of European gasoline standards, the D4 petrol engine offers significant improvements in output, torque, economy and emissions over the current unit.

With CO₂ emission figures as low as 181 g/km, D4 petrol will prove a major attraction to the company car driver in search of a high performance saloon. The advanced 2.0 common-rail, direct injection diesel engine (D4-D) was introduced to the Avensis range in SR form last October and is now available across the range. Unlike competitors, who offer less powerful models at entry level, the 110bhp D4-D will be installed from S grade up.

Chassis and Brakes

The Avensis has always been praised for its high level of ride comfort and class leading refinement, however the handling has received some criticism – especially when pushed hard.

The suspension has been re-worked on the new model, with a lowered stance and revised shock absorbers and suspension bushings. These changes result is a significant reduction in body roll and improved front-end grip. Steering feel has also been improved. The overall effect is to increase driver involvement and appeal without sacrificing ride comfort.

Active safety has been significantly improved on the new model. All variants are equipped with an Anti – lock Braking System that now additionally features Electronic Brake force Distribution (EBD) for increased stability under braking. Rear disc brakes are introduced and larger, ventilated front disc brakes are standard across the range – offering significant improvement in brake performance.

On high series 2.0 D4-petrol derivatives, the latest active safety features are fitted as standard. Toyota's Vehicle Stability Control (VSC), incorporating Traction Control (TRC) and Brake Assist (BAS) systems monitor driver input and wheel slip to maintain vehicle stability and driver control.

Comfort and Convenience

Avensis drivers are likely to spend a great deal of time in their car. Interior comfort and convenience is therefore an important factor both in the original purchase decision and in customer retention. It is for this reason that the majority of design changes to the new car are focused on the inside of the vehicle.

Much attention has been given to the detailing of the cabin – introducing chrome and rubber to control surfaces. The audio and heating controls have been re-sited and tactile feel improved.

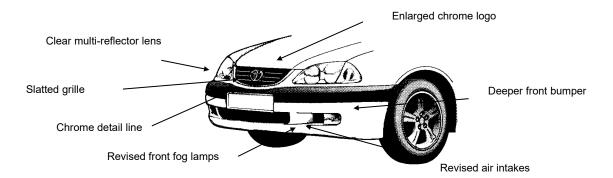
Interior plastic shades have been darkened to give a richer ambience, while revised seat materials add further to the sophisticated feel of the new car. Audio and instrument illumination are matched in a coolblue colour to reduce eyestrain.

Audio systems are improved across the range. GS models and above gain additional 'tweeter' speakers set into the A-pillar for improved definition plus audio controls situated on the steering wheel, with the additional convenience of an on/off function. CD audio systems are standard on all but the entry S versions.

All models feature integrated audio display with trip computer functions (instant and average fuel consumption, average speed, external temperature and range functions). The display in all models is compatible with the Toyota TNS200 enhanced Turn-by-Turn navigation system that is available on Yaris, Corolla, Previa and RAV4. The navigation system is fitted as standard to all GS, GLS and CDX derivatives - a unique feature in this competitive sector.

Exterior Changes

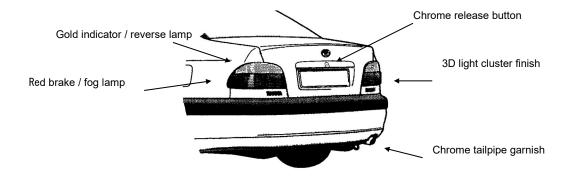
The exterior of Avensis has undergone a number of subtle detailing changes. The radiator grille has been widened and a chrome detail line added to provide a more substantial feel. The Toyota logo is moved from the front bonnet and now features prominently in the slatted grille.



SR models feature a mesh grille to provide a more sporting appearance.

The front bumper has been redesigned, offering greater depth between the unpainted section and lower air intakes. This has the effect of further widening and lowering the front profile of the vehicle.

The luggage door release button is now finished in chrome.



The exhaust tailpipe is provided with a chrome garnish for improved appearance.

Avensis dimensions are broadly unchanged, however changes to bumper design have increased overall length and front overhang by 30mm.

Lights

Multi-reflector type headlamps are introduced, incorporating clear lens technology. This has enabled the enlargement of illumination angle to improve low beam night visibility. The reflector type system absorbs less light energy than traditional lens headlamps and therefore high beam penetration is also improved. The side turn indicator lights are now clear glass to match the headlamp and improve the frontal appearance of the vehicle.

The front fog lamps have been re-designed and are more compact with 'jewel effect' lens. They have been set further back within the bumper to provide a greater feeling of depth.

The rear light cluster has been completely re-designed with a defined two-tone finish. A three dimensional surface form adds definition, while red and champagne gold colours are used to provide visual differentiation.

The new light clusters give Avensis more distinctive rear styling.

Wheel Options

Four of the six Avensis grades now feature standard alloy wheels plus locking wheel-nuts. All Avensis models now feature a unique wheel design.

15" Steel wheel (S & GS)

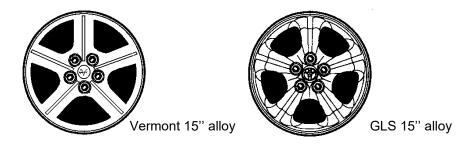
Both S and GS models feature 15" steel wheel with full wheel caps. The combination of improved grille and larger wheel/tyre significantly increases the presence of the entry S grade.





15" Alloy wheel (Vermont and GLS)

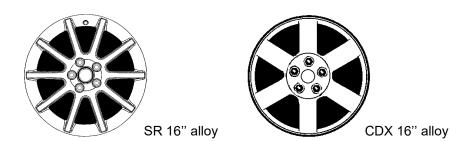
Vermont and GLS feature 15" alloy wheels. The Vermont design is new and is an attractive five spoke design. The GLS gains the 15" alloy wheels previously fitted to the CDX derivatives.



Both Vermont and GLS models are supplied with a steel spare wheel.

16" Alloy wheel (SR & CDX)

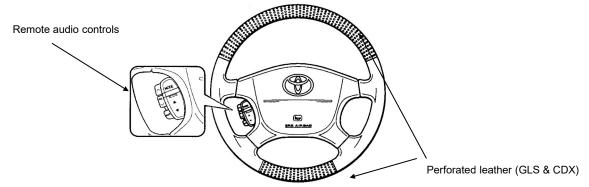
SR and CDX models are now equipped with 16" alloy wheels. The SR wheel is a larger version of the ten-spoke alloy wheel currently fitted to the Yaris SR. While adding considerably to the appearance of the Avensis, the alloy wheel provides a link to the sporting SR sub-brand that is unique to the UK.



The CDX wheel is a newly developed wheel designed to capitalise on the increased maturity of the new Avensis. Similar to designs fitted to premium marques, the six-spoke, flat faced wheel befits the new top-of the range Avensis.

Both SR and CDX models are supplied with matching 16" alloy spare wheel.

Audio controls



GS models and above feature remote audio controls, mounted on the steering wheel. These controls allow the driver to adjust volume, change station/track and switch the unit on/off.

In car entertainment / Navigation Systems

All models feature an integrated audio system with four speakers and Radio Data System (RDS).

A trip computer is provided as standard equipment on all Avensis. The computer can display instant and average fuel consumption (I/100km; km/l; mpg), average speed (km/h; mph) and continuous driveable distance / range (km; miles).

The multi-information display also displays time, external temperature and audio information. On GS, GLS and CDX models, the display operates the standard TNS200 navigation system, providing guidance information and detailed junction layouts.

Air Conditioning and Sunroof

All models in the Avensis range (with the exception of the S) feature air conditioning as standard. Therefore, the tilt-slide glass sunroof will now be available only on the top-of-the-range CDX derivatives. Its deletion has enabled the introduction of satellite navigation without an increase in retail price.

The removal of the sunroof from GS and GLS models has the added benefit of increasing headroom by around 50mm (2").

Safety

Avensis was one of the first cars in the UK to feature standard seat mounted lateral airbags on all models. For the new model, Avensis introduces the latest active safety systems to the segment as standard equipment on 2.0 VVT-i SR, GLS and CDX models.

Anti-Lock Braking System With Electronic Brake Force Distribution (EBD)

The standard Anti-lock Braking System is enhanced through the introduction of Electronic Brake force Distribution (EBD).

EBD uses speed sensors on each wheel to calculate the slipping condition of each wheel. Brake force is then distributed to those wheels with the least slip to ensure stable and efficient braking. In the event of a malfunction of the ABS system, the ABS warning light will be activated and the ABS system will not operate. Should the EBD system malfunction, the brake system warning light will illuminate and the EBD control will be disabled.

VSC, TRC and BAS (2.0 VVT-i models)

2.0 litre petrol SR, GLS and CDX models are equipped with state of the art active safety features.

The wheel brake sensors and 'fly-by-wire' throttle control fitted with the 1AZ-FSE engine allow the installation of sophisticated active safety systems such as traction control and vehicle stability control. In addition, electronic brake assist is standard equipment.

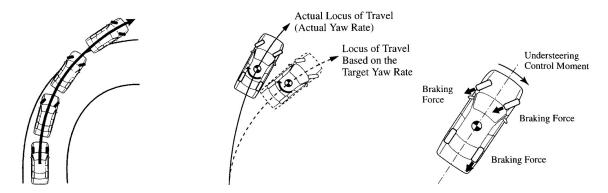
ABS and TRC are intended to maintain stability and control under acceleration and braking. VSC assists stability and control during cornering, while BAS improves brake pressure under emergency braking, fully utilising the efficiency of the ABS and EBD systems.

Traction control (TRC)

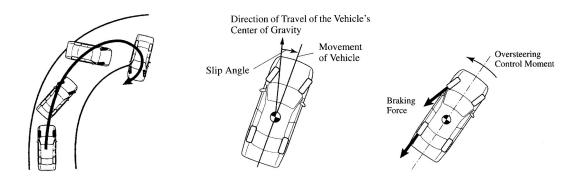
Traction control utilises the wheel sensors of the ABS system to detect wheel spin. The ECU then restricts throttle input and applies precise brake pressure to prevent loss of control.

Vehicle stability control (VSC)

Vehicle Stability Control additionally uses yaw and lateral acceleration sensors to detect oversteer or understeer. The ECU calculates the intended Locus of Travel based upon vehicle speed and steering angle (target yaw rate). The yaw sensor enables the ECU to calculate the actual Locus of Travel: where the actual yaw rate is less than the target yaw rate, understeer is detected. The VSC system will control engine output and brake the front wheels plus the inside rear wheel to reduce the understeer.



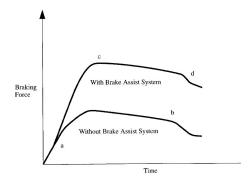
To detect and control oversteer, the lateral acceleration sensors detect slip angle and velocity. Where the slip velocity and angle are large, oversteer is detected. The VSC system will control engine output and apply brake force to the outer wheels, pulling the wheel back in line.



Brake assist system (BAS)

The Brake Assist system assesses brake pedal pressure and speed to detect emergency procedure and supplements the braking power if the driver has not applied sufficient pressure to the brake pedal.

Drivers that have limited experience with ABS systems are often tentative and do not apply full pressure to the brake pedal – in order to avoid loss of control. In addition, brake pedal pressure is often not maintained. Brake assist will boost brake pressure in this circumstance, so that the ABS and EBD systems are fully operated and minimum brake distance is achieved.



The Brake Assist system monitors driver brake pressure and when an emergency brake situation is detected (based upon pressure and speed of application), applies additional brake fluid pressure to

reduce stopping distance. The additional brake force is maintained until the system detects intentional release of brake pedal.

The system has been designed so that the driver is unaware that the brake assist is taking place, and will closely follow the actions of the driver. The brake assist system will not increase the overall stopping performance of the vehicle, however when tested with less experienced drivers, the system reduced stopping distances by up to 30%.

Security

The key-fob for all models has been replaced with the compact key type introduced on recent new Toyota models.

All models are equipped with a key operated, transponder type engine immobiliser. Mechanical security has been improved with the introduction of double locking to all variants. This additional security feature ensures that Avensis continues to meet the exacting security standards set by the Association of British Insurers (ABI) and ensures competitive group rating results.

GS, SR, GLS and CDX models are fitted with a TVSSIV alarm system. The system includes both perimeter and volumetric monitoring and meets Thatcham category one standards.

All Avensis models are window etched and details recorded on the International Security Register. This register can also record mileage and finance details for re-sale. Over 200,000 vehicles have been registered with the ISR since introduction on Corolla in 1997.

The overall security of Avensis exceeds the security requirements of the Association of British Insurers (ABI), therefore competitive insurance ratings have been achieved.

Environment

All new Avensis engines meet the tough, European Step 3 emission standards. In addition, the 1ZZ-FE 1.8 litre models meet European Step 4 requirements, to be introduced in 2005.

VVT-i and direct injection technology mean that all new Avensis petrol models feature class leading economy and very low CO₂ emissions, while all D4-D models are fully competitive. Toyota continues to lead the motor industry in the development of green technologies.

SECTION THREE

Specification and Pricing

Due to the competitive nature of the upper medium segment, the significant improvements incorporated into the new model are introduced without significant increase in price. Selected models have been significantly reduced and offer outstanding value to the retail customer.

A two-tier approach has been adopted for the new Avensis, reflecting the market split between fleet and retail requirements

The existing S, GS, GLS and CDX grades will be retained, providing a clearly hierarchical structure for the dominant fleet sector. These grades are positioned competitively against the mainstream grades of primary competitor models (Ford Mondeo, Peugeot 406, Vauxhall Vectra).

For retail customers the highly successful SE specification is carried forward to the new line up. Rebadged as 'Vermont', the new grade will now form a permanent addition to the line-up. Vermont is not a special edition, but is targeted against 'feature models' such as the Ford Mondeo Verona, Peugeot 406 Rapier and Vauxhall Vectra Club.

The SR model continues however it now shares higher quality interior upholstery and metallic centre console with the GS grade. Popular with both fleet and retail customers, the SR is positioned as a sporting alternative to the GLS. The 2.0 SR (complete with VSC) is priced at the same level as the 1.8 GLS.

Specification

S

The standard specification of the Avensis S is generous and includes:

- Driver, front passenger and front-seat mounted front lateral airbags
- Anti-lock Braking System with Electronic Brake force Distribution
- Rear disc and ventilated front disc brakes
- Remote central double locking
- Electric front windows and exterior mirrors
- Four speaker RDS radio cassette
- Driver seat height adjustment and lumbar support
- Grasmere velour upholstery
- Multi-information display with trip computer functions

• 15" steel wheels with full size wheel trim

Vermont

The high value Vermont model adds the following desirable features

- Climate control air conditioning
- Four speaker RDS CD Tuner
- 15" Vermont five spoke alloy wheels (x4)

GS

The biggest selling fleet derivative adds the following:

- TNS200 satellite navigation system with UK CD ROM
- Six speaker RDS CD Tuner plus steering wheel audio controls
- TVSSIV Thatcham category 1 alarm system
- Heated electric exterior mirrors
- Patterdale velour upholstery
- Mud guards
- 15" steel wheel with full size wheel trim

GLS

The GLS offers the following additional specification over the GS:

- Wood look centre console and ventilation surround
- · Leather steering wheel and gear lever cover
- Luxury Langdale velour upholstery
- Front and rear electric windows
- Colour keyed door mirrors and exterior door handles
- Rear privacy glass
- Front fog lamps
- Vehicle Stability Control, Traction Control and Brake Assist systems (2.0 petrol models)
- 15" five spoke alloy wheels

SR

The SR grade is a sporting alternative to GLS and offers the following items over GS specification:

- Sports mesh grille
- Colour keyed rear spoiler
- Metallic paint

- Colour keyed door mirrors and exterior door handles
- Front and rear electric windows
- Front fog lamps
- Vehicle Stability Control, Traction Control and Brake Assist systems
- 16" SR ten spoke alloy wheels

The SR does not feature the TNS200 satellite navigation system.

CDX

The top of the range CDX model features GLS specification plus:

- Illinois leather upholstery
- Electric tilt/slide glass sunroof with shade
- Six speaker RDS radio / cassette (logic deck) plus six disc boot mounted CD autochanger
- 16" CDX six spoke alloy wheels

Insurance groups

Avensis was previously awarded best in class insurance group ratings due to the comparative poor performance, however the new class leading performance has inevitably resulted in higher group ratings.

GRADE	E/G	NEW	C/G
S	1.6 VVT-i	7E	7E
	2.0 D4-D	8E	8E
Vermont	1.6 VVT-i	8E	7E
	1.8 VVT-i	10E	8E
	2.0 D4-D	9E	
GS	1.6 VVT-i	8E	7E
	1.8 VVT-i	10E	8E
	2.0 VVT-i	11E	
	2.0 D4-D	9E	8E
SR	2.0 VVT-i	11E	10E
GLS	1.8 VVT-i	11E	8E
	2.0 VVT-i	12E	10E
	2.0 D4-D	10E	
CDX	1.8 VVT-i	11E	9E
	2.0 VVT-i	12E	10E
	2.0 D4-D	10E	

The new groups remain competitive within the segment and continue to benefit from a group reduction due to the standard security systems fitted to Avensis.

Fleet Running Costs

Some 75 per cent of Avensis sales are in the fleet or company car sector. Here, not only are standard specification and mechanical refinement important, but competitive running costs are vital. Thanks to the economy and extended maintenance periods of the new engines, and Toyota's continuing work on reducing parts prices for servicing, the running costs of the Avensis are among the best in this sector.

Toyota Fleet have given used the data on the new car to produce the following results when calculated over a typical three year/60,000mile period. (Fuel price used - £3.86/galon or 85p per litre)

	Toyota Avensis GS	Ford Mondeo LX	Vauxhall Vectra LS	Renault Laguna Alize SR	Peugeot 406 LX	VW Passat S 20v
Engine cc	1.8	1.8	1.8	1.8	1.8	1.8
RRP	£14,590	£15,295	£15,285	£14,695	£14,690	£15,925
On The Road	£15,090	£15,820	£15,810	£15,195	£15,215	£15,925
Capital Cost	£13,631	£14,290	£14,281	£13,579	£14,040	£14,920
MPG	39.2	38.2	38.2	35.8	33.6	32.5
Residual Value	5,750	5,121	5,044	5,090	4,976	6,321
Depreciation	7881	9170	9237	8488	9064	8599
SMR	1861	1996	2077	2189	1578	1787
Fuel	6063	6069	6069	6475	6899	7133
Insurance	1467	1353	1353	1782	1467	1569
СРМ	28.79	30.98	31.23	31.56	31.68	31.81
Monthly	480	516	520	526	528	530

The superior fuel economy of the new engines, as well as Toyota's traditionally strong residual values, combine with the low servicing costs to give Avensis significantly the lowest monthly costs of all these key Fleet players. Only Avensis comes in under the 30 pence per mile barrier.

Competitor Value Analysis

As well as significant improvements in design, performance, economy, emissions, equipment, and handling the new Avensis continues to offer excellent value. With an entry-level price of just £12,995, new Avensis is aggressively positioned within the segment.

Avensis Vermont

The Vermont 1.6 VVT-i is available at an MRP of just £12,995 on the road. At this price the Vermont not only undercuts competitor MRP's, but offers exceptional value for money:

	Toyota AVENSIS 1.6 Vermont	Ford MONDEO 1.6 Verona	Mitsubishi CARISMA 1.6 Equippe	Peugeot 406 1.8 L AC	Skoda OCTAVIA 1.6 GLXi	Vauxhall VECTRA 1.6 Club	VW BORA 1.6S
OTR MRP £	£12,995	£13,495	£13,745	£14,920	£14,075	£14,395	£14,400
Power output (bhp)	109	94	100	112	99	100	100
Maximum speed (mph)	121	115	115	119	117	114	117
0-62mph (secs)	11.3	11.9	12.1	12.4	12.2	12.9	11.7
Combined fuel economy (mpg)	39.8	37.7	38.7	33.6	36.2	39.2	35.8
CO2 Emission levels (g/km)	170	178	174	198	187	175	190
Driver, front passenger & side airbags	~	Driver	D:P only	~	D:P only	D:P only	~
ABS with EBD plus rear Disc brakes	~	-	ABS	ABS	ABS	ABS/Disc	ABS/Disc
VSC, TRC & BAS	-	-	-	-	TRC	-	-
Remote central double locking	~	~	Central	•	Double	~	Double
Climate control air conditioning	~	Manual	Manual	Manual	Manual	Manual	Manual
Electric tilt/slide glass sunroof	-	-	~	-	-	-	-
Electric front windows	~	V	~	V	F:R	~	F:R
Power door mirrors	~	Manual	Heated	Heated	Heated	Manual	Heated
4 speaker CD RDS tuner	~	Cassette	Cassette	~	Cassette	V	Cassette
Computer (Fuel; Speed; Range; Temp)	~	-	Fuel	•	•	Ex temp	-
Velour upholstery	~	Cloth	~	Cloth	Cloth	Cloth	Cloth
15" Alloy wheels	~	V	-	-	-	V	-
Front fog lamps	-	-	-	~	~	-	-
Specification Adjustment		£930	£560	£560	£540	£380	£550
Specification Adjusted Price £		£14,425	£14,305	£15,480	£14,615	£14,775	£14,950
Avensis vs Competitors		- 9.91%	- 9.16%	- 16.05%	- 11.08%	- 12.05%	- 13.08%

^{*} Non Thacham approved alarm system

On a specification adjusted basis, the new Avensis Vermont offers 10% better value than key rivals.

Avensis GS

The GS is likely to be the best selling model, particularly with fleets. With standard satellite navigation, Thatcham approved alarm and climate control air conditioning, the new Avensis continues to offer more standard equipment than its key competitors.

	Toyota	Ford	Nissan	Peugeot	Renault	Vauxhall	VW
	AVENSIS	MONDEO	PRIMERA	406	LAGUNA	VECTRA	PASSAT
	1.8 GS	1.8 LX	1.8 S	1.8 LX	1.8 Alize	1.8 LS	1.8 S
OTR MRP £	£15,245	£16,000	£15,300	£15,395	£15,375	£15,990	£16,105
Power output (bhp)	127	114	113	112	120	114	125
Maximum speed (mph)	127	121	123	119	126	124	128
0-62mph (secs)	10.0	10.2	11.0	12.4	10.7	11.5	10.9
Combined fuel economy (mpg)	38.2	38.2	38.7	33.6	35.8	38.2	32.5
CO ₂ Emission levels (g/km)	176	175	177	198	186	178	209
Driver, front passenger & side airbags	~	Driver	~	~	~	D:P only	~
ABS with EBD plus rear Disc brakes	~	ABS/Disc	~	ABS	ABS	ABS/Disc	ABS/Disc
VSC, TRC & BAS	-	TRC	BAS	-	-	-	-
Remote central double locking	~	~	~	~	Remote	~	~
Volumetric alarm system (Thatcham 1)	~	Perimeter	✓ *	-	-	-	~
Climate control air conditioning	~	Manual	~	~	Manual	Manual	~
Electric tilt/slide glass sunroof	-	-	-	-	~	-	-
Electric front windows	~	~	~	F:R	~	~	F:R
Heated power door mirrors	~	~	~	V	~	Manual	V
6 speaker CD RDS tuner (remote)	~	4 Speaker	Cassette	4 Speaker	~	~	Cassette
Computer (Fuel; Speed; Range; Temp)	~	-	Ex temp	V	Ex temp	Ex temp	V
Satellite Navigation (eTBT)	~	-	-	-	-	-	-
Velour upholstery	~	Cloth	Cloth	~	~	Cloth	Cloth
Leather steering wheel	-	-	-	-	Leather	-	-
Front fog lamps	-	~	-	~	~	-	-
Specification Adjustment		£1,065	£855	£875	£670	£1,305	£650
Specification Adjusted Price £		£17,065	£16,155	£16,270	£16,045	£17,295	£16,755
Avensis vs Competitors		- 10.67%	- 5.63%	- 6.30%	- 4.99%	- 11.85%	- 9.01%

^{*} Non Thacham approved alarm system

The Avensis GS offers between 5 and 10% more value than comparable rival models.

Avensis GLS

The GLS model, with satellite navigation, alloy wheels and Thatcham alarm as standard, offers excellent value. Here the new GLS D4-D model is compared to the leading diesel models from Citroen, Peugeot, Volkswagen and Renault – as well as the less advanced Mondeo and Vectra diesel derivatives.

	Toyota	Citroen	Ford	Peugeot	Renault	Vauxhall	VW
	AVENSIS	XANTIA	MONDEO	406	LAGUNA	VECTRA	PASSAT
	D4-D GLS	HDi SX	1.8TD GLX	HDi GLX	DCi RXE	DTi GLS	TDi PD SE
OTR MRP £	£17,995	£18,605	£17,000	£18,295	£18,875	£18,230	£18,900
Power output (bhp)	109	110	89	110	110	99	115
Maximum speed (mph)	121	118	111	119	118	121	124
0-62mph (secs)	11.4	11.2	12.3	12.5	11.8	12.0	10.7
Combined fuel economy (mpg)	47.9	51.4	46.3	51.4	50.4	49.6	51.4
CO ₂ Emission levels (g/km)	158	150	166	150	149	154	149
Driver, front passenger & side airbags	~	~	Driver	~	~	D:P only	~
ABS with EBD plus rear Disc brakes	~	ABS/Disc	ABS/Disc	ABS/Disc	ABS	ABS/Disc	ABS/Disc
VSC, TRC & BAS	-	-	TRC	-	-	-	TRC
Remote central double locking	~	~	~	~	Remote	~	~
Volumetric alarm system (Thatcham 1)	~	✓ *	Perimeter	-	-	~	~
Climate control air conditioning	V	Manual	~	~	~	Manual	~
Electric tilt/slide glass sunroof	-	-	~	-	~	~	-
Electric windows front & rear	~	~	Front	V	~	Front	~
Heated power door mirrors	~	~	~	~	~	~	~
6 speaker CD RDS tuner (remote)	~	~	4 Speaker	4 Speaker	Cassette	~	~
CD Autochanger	-	-	-	-	6 Disc	-	-
Computer (Fuel; Speed; Range; Temp)	~	Ex temp	-	~	~	Ex temp	~
Satellite Navigation (eTBT)	~	-	-	-	-	-	-
Velour upholstery	~	~	Cloth	~	1/2 leather	Cloth	~
Leather steering wheel	~	-	~	-	~	-	-
Spoiler	-	Rear	-	-	Rear	-	-
15" Alloy wheels	~	-	~	~	16"	~	~
Front fog lamps	~	~	~	~	~	~	-
Specification Adjustment		£1,120	£675	£1,005	-£215	£800	£540
Specification Adjusted Price £		£19,725	£17,675	£19,300	£18,660	£19,030	£19,440
Avensis vs Competitors		- 8.77%	+ 1.81%	- 6.76%	- 3.56%	- 5.44%	- 7.43%

^{*} Non Thacham approved alarm system

Again, Avensis offers excellent value when compared against similar engined rivals. While the Ford offers similar value, the superior performance, economy and CO₂ emissions of Avensis will leave the Mondeo at a considerable disadvantage.

Avensis CDXThe 2.0 VVT-i CDX is the top-of-the-range Avensis and boasts an impressive list of standard features.

	Toyota AVENSIS 2.0 CDX	Ford MONDEO 2.0 Ghia X	Honda ACCORD 2.0 SE Exec	Peugeot 406 2.0 Exec	Renault LAGUNA 2.0 Monaco	Vauxhall VECTRA 2.0 CDX	VW PASSAT 2.3 V5
OTR MRP £	£19,745	£20,000	£20,250	£19,820	£20,575	£20,980	£21,595
	4.47	400	445	407	440	101	450
Power output (bhp)	147	129	145	137	140	134	150
Maximum speed (mph)	130	128	130	129	129	131	138
0-62mph (secs)	9.1	9.4	9.9	10.8	9.8	9.5	8.9
Combined fuel economy (mpg)	37.2	33.2	32.1	34.0	36.7	33.2	29.1
CO ₂ Emission levels (g/km)	181	202	209	203	182	204	233
Driver, front passenger & side airbags	~	~	~	~	~	~	~
ABS with EBD plus rear Disc brakes	~	ABS/Disc	ABS/Disc	~	ABS/Disc	ABS/Disc	ABS/Disc
VSC, TRC & BAS	~	TRC only	-	-	-	TRC only	TRC only
Cruise control	-	•	•	~	-	-	-
Remote central double locking	~	~	~	~	Remote	~	~
Volumetric alarm system (Thatcham 1)	~	Perimeter	-	v *	~	~	~
Climate control air conditioning	~	~	~	V	V	~	~
Electric tilt/slide glass sunroof	~	~	~	V	~	~	-
Electric windows front & rear	~	~	~	V	~	~	~
Heated power door mirrors	~	~	~	~	~	~	~
6 speaker RDS Radio cassette (Remote)	~	4 Speaker	~	V	~	~	~
6 Disc CD autochanger	~	~	-	~	~	~	~
Computer (Fuel; Speed; Range; Temp)	~	~	Ex Temp	~	~	~	~
Satellite Navigation (eTBT)	~	-	-	-	Full map	-	-
Leather upholstery	~	Heated	Heated	Heated	V	~	Alcantara
Leather steering wheel	~	~	~	~	~	~	~
Spoiler	-	-	-	-	Rear	-	-
16" Alloy wheels	~	~	15"	15"	~	~	~
Front fog lamps	~	~	~	~	~	~	-
Specification Adjustment		£1,095	£1,785	£1,295	-£230	£1,280	£1,710
Specification Adjusted Price £		£21,095	£22,035	£21,115	£20,345	£22,260	£23,305
Avensis vs Competitors		- 6.40%	- 10.39%	- 6.49%	- 2.95%	- 11.30%	- 15.28%

^{*} Non Thacham approved alarm system

Only the Renault Laguna Monaco – with a standard full map 'Carimat' navigation system can come close to matching the value for money of the Avensis CDX - however VSC is not available on any competitor model at this level.

SECTION FOUR

HIGH PERFORMANCE, VVT-i PETROL ENGINES

- New Variable Valve Timing -intelligent (VVT-i) engines
- Class leading performance and economy
- New direct injection D4, 2-litre petrol engine tops range
- Step 3 Euro emission standards met (Step 4 for 1.8-litre)
- Reduced maintenance costs

The award-winning Toyota Variable Valve Timing-intelligent (VVT-i) technology, which has already been introduced on highly praised Toyotas including Yaris, Celica, MR2 and new RAV4, is now available on the invigorated Avensis range.

The VVT-i advanced technology uses sophisticated computer control of engine valve timing to create constantly variable valve overlap. The result is higher torque output across all engine speeds, better fuel consumption and less harmful emissions.

The introduction of the new VVT-i engine range means the Avensis is able to offer class leading fuel consumption and performance across all three available engine sizes - 1.6-litre, 1.8-litre and 2.0-litre. It means Toyota has been able to build on the already impressive performance of its existing lean-burn engine technology, reducing fuel consumption and pollutant levels still further.

D4 - NEW DIRECT INJECTION PETROL

The 2.0-litre, D4, direct injection petrol engine, which will be introduced with the Avensis range, is a fresh development from Toyota. It combines VVT-i technology with a new, direct injection petrol system that offers even greater fuel efficiency, lower emissions and improved performance.

As its name suggests, the D4 system injects a precise amount of petrol at high pressure directly into the combustion chamber above the piston head - rather than into a pre-combustion area - and creates suitable conditions for achieving excellent fuel consumption. The computerised direct injection system controls precisely the timing of the fuel injection and the amount of fuel used. The high pressure injector ensures fuel is highly atomised and ready for maximum combustion efficiency.

MORE POWER, MORE PERFORMANCE

The new D4 engine, designated 1AZ-FSE, is 1998cc, 16-valve unit, which develops 147bhp at 5,700rpm and has a maximum torque of 200Nm at 4,000rpm. The adoption of the VVT-i technology ensures high torque is available across a wide engine speed range, helping create relaxed driving conditions and reduce fuel consumption.

The new engine has 17 percent more power and 12 percent more torque than the engine it replaces to give the new Avensis range class leading performance. The new manual transmission Avensis D4 saloon and liftback has a top speed of 130mph and will accelerate to 62mph in 9.1 seconds.

LESS CONSUMPTION, LESS POLLUTION

Despite this increase in performance, the new Avensis uses less fuel – *achieving 36.7mpg* on the European combined cycle (saloon model manual transmission).

Exhaust gases are cleaner too. A catalytic converter has been integrated into the exhaust manifold with oxygen sensors at both the inlet and outlet points. These help control precisely the air-fuel ratio in order to achieve maximum burn. The new Avensis D4 complies with European Step 3 exhaust emission regulations.

POTENT, ECONOMICAL 1.8-LITRE

The new 1.8-litre Avensis uses the latest version of the Toyota VVT-i engine, which has already been launched in sports models, such as the new Celica and MR2 Roadster. It give the new sedan outstanding, class leading performance and economy.

The 1ZZ-FE engine is a 1794cc, 16-valve unit, which develops 127bhp at 6,000rpm and 170Nm of torque at 4,200rpm. This powers the new Avensis sedan or liftback to a top speed of 127mph and from rest to 62mph in 10.0 seconds.

The 1.8-litre VVT-i engine is one of the cleanest available on the market today and already complies with European Step 4 exhaust emission regulations. On the combined European cycle the manual saloon model achieves 38.2mpg.

RELAXED, ECONOMICAL 1.6-LITRE

The adoption of VVT-i technology has boosted low and mid-range torque on the new 1.6-litre Avensis to create a more relaxed, easier driving style without sacrificing class leading performance or economy.

The new 3ZZ-FE engine is a 1598cc, 16 valve unit, which develops 109bhp at 6,000rpm and 150Nm of torque at 3,800rpm. It will power the new Avensis to a top speed of 121mph and accelerate to 62mph in 11.3 seconds.

Fuel economy on the European combined cycle is 39.8mpg for the saloon.

REDUCED MAINTENANCE

All three new, high technology petrol engines have been fitted with chain driven overhead camshafts to eliminate the need to replace camshaft drive belts and make a significant reduction in maintenance costs.

The D4 direct-injection petrol engine has an oil level gauge clearly visible at the front of the car for a quick and easy oil level check. Drive belts are auto-tensioned to make adjustment unnecessary and iridium type spark plugs are fitted for extended replacement intervals.

All three engines have reinforced cylinder blocks to reduce the radiated noise and vibration and improve passenger comfort.

D4-D - A CLEAN, QUIET COMMON RAIL DIESEL ENGINE

- Direct-injection, common rail diesel boosts performance
- Fuel economy up, 47.9mpg (Euro combined cycle)
- Meets Euro Step 3 emissions targets
- Refinement up, noise levels down

Avensis was the first car in Toyota's European model range to benefit from the introduction of the newly developed, D4-D, direct injection, common rail diesel engines.

The introduction of D4-D in Avensis, and eventually in other Toyota models such as Corollas, RAV4 and Previa, reflects the company strategy of using 'intelligent technology' to boost performance, reduce emissions and provide a better driving experience for customers.

It means Avensis is one of the best performing and most comfortable diesel-engined cars in the highly competitive D-segment at a time when demand for diesel power is growing rapidly. Last year around 40 per cent of all cars sold in this segment were diesels and the diesel market share has been growing consistently over the past decade. (UK data)

HIGH PERFORMANCE

The D4-D engine, officially designated 1CD-FTV, is a 1995cc, four cylinder, turbocharged and intercooled unit which delivers 81kW (109bhp) of power at 4,000 rpm and maximum torque of 250Nm at 2,000 to 2,400 rpm. Twin overhead camshafts are belt driven and operate four valves per cylinder.

Torque output is virtually constant throughout the engine speed range and results in superb driveability with smooth acceleration in city driving and on the open road. Drivers will feel the real benefit in in-gear acceleration figures - the car can cover a standing 400m in 17.8 seconds.

The Avensis saloon and liftback D4-D models have a top speed of 121mph and will accelerate to 62mph in *11.4 seconds*. The Avensis D4-D estate has a top speed 118mph and acceleration to 62mph in 11.6 seconds.

Despite its lively performance, fuel consumption is around **11** percent better than previous Avensis diesel models and the new Avensis D4-D achieves 47.9mpg on the European combined cycle.

ENVIRONMENTAL BENEFITS

As a result, the new Avensis D4-D is among the most fuel efficient cars in its segment on the market today and potentially harmful emissions are reduced, thanks to the improved fuel consumption and more efficient combustion of the direct injection engine. Emissions of the main greenhouse gas, CO2, are cut by around 10 percent.

An exhaust gas recirculation unit (EGR) helps cut NOx emissions by over 60 percent. The new engine produces no smoke and particulate emissions are cut by 44 percent.

The new Avensis D4-D is one of the few diesel-engined cars on the European market that meets Euro Step 3 emission targets. *(Check please)* Performance and economy are further enhanced by intelligent engineering to reduce overall weight. The engine turbocharger and intercooler are compact and efficient and the main water radiator uses an aluminium core.

NOISE POLLUTION

The new Toyota common rail diesel engine addresses the increasingly sensitive issue of noise pollution by offering exceptionally low levels for an engine of this type.

Progressive burn in the combustion chamber reduces the 'ignition shock' to cut noise and vibration. Installation is sophisticated, with sound and vibration absorbing engine mounts and the whole power unit is shielded in order to reduce internal and external noise levels.

HOW COMMON RAIL WORKS

Until recently, diesel engines relied on relatively simple technology with a low-pressure mechanical injector delivering fuel to a pre-combustion chamber in the cylinder head, where a single ignition - fired by the intense heat of high compression - takes place.

The system was reasonably fuel efficient but lacked precision and refinement, leading to vibration and noise. Fuel combustion can be incomplete, allowing smoke and other emissions to pass into the exhaust.

Toyota's common rail system makes use of a high pressure pump and intelligent, computer controlled injectors to deliver precisely the right amount of fuel, at precisely the right time, directly into the centre of the combustion chamber.

Fuel is stored at high pressure, up to 135 MPa, in a single reservoir - the common rail - before being fired into the cylinder. The high pressure injection creates better fuel atomisation for more power, cleaner burning and better fuel economy. The precise timing and measurement of fuel promotes better ignition, cleaner burning, better fuel economy and fewer emissions.

In addition, the computer control allows a tiny amount of fuel into the combustion chamber a few microseconds before the main ignition - so-called pilot injection - to provide a degree of pilot burn. This smoothes out the shock of the main combustion to create less noise and harshness and deliver smoother power.

Combustion takes place directly on the piston head for maximum power and efficiency. Each of the four lightweight, aluminium alloy pistons is crowned with a combustion chamber, precisely shaped for optimum burn and fuel efficiency.

SECTION FIVE

TOYOTA AVENSIS TECHNICAL SPECIFICATIONS

ENGINE 1.6L							
Type		3ZZ-FE					
Valve Mechanism		16 valve,	DOHC \	/VT-i Ch	ain-Drive	<u> </u>	
Fuel System		Electronic					
Displacement (cc)		1598					
Bore x Stroke (mm)		79 x 81.5					
Compression ratio		10.5:1					
Max. Power (kW) DIN bhp/rpm		(81 kW) 1	വരത്ത	<u> </u>			
Max. Torque (Nm/rpm)		150@3800	103@000	0			
ENGINE 1.8L		1006000					
Туре		1ZZ-FE					
Valve Mechanism		16 valve,	DOHC \	/\/T_i	ain_Drive		
Fuel System		Electronic			iaiii-Diiv	<u>-</u>	
Displacement (cc)		1794	or acring	COLIOIT			
Bore x Stroke (mm)	79.0 x 91	.5					
Compression ratio	. ,						
Max. Power (kW) DIN bhp/rpm		10.0:1 (95kW) 1:	27@6000)			
Max. Torque (Nm/rpm)		170@4200					
ENGINE 2.0L D4		170@4200					
Туре		1AZ-FSE					
Valve Mechanism		16 valve,		/VT-i, Ch	ain-Drive	Э	
Fuel System		Direct Inje	ection				
Displacement (cc)	1998						
Bore x Stroke (mm)	86 x 86						
Compression ratio	11.0:1						
Max. Power (kW) DIN bhp/rpm		(110kW)	147@570	00			
Max. Torque (Nm/rpm)		200@4000					
ENGINE 2.0L D4D							
Туре		1CD-FTV	•				
Valve Mechanism		16 valve, DOHC,Belt-Drive					
Fuel System		Direct Injection with common rail					
Displacement (cc)		1995					
Bore x Stroke (mm)		82.2 x 94	.0				
Compression ratio		18.6:1					
Max. Power (kW) DIN bhp/rpm		(81kW) 1	09 @4,00	00			
Max. Torque (Nm/rpm)		250Nm@					
ACCELERATION (sec)	1.6L	1.8L	· ,	2.0L D4	1	2.0L D4D	
(555)	5 M/T	5 M/T	4 A/T	5 M/T	4 A/T	5 M/T	
0-62mph							
Saloon	11.3	10.0	11.4	9.1	9.9	11.4	
Liftback	11.3	10.0	11.4	9.1	9.9	11.4	
Estate	11.5	10.2	11.6	9.3	10.1	11.6	
Max.Speed (mph)	7		1		1.5		
Saloon	121	127	121	130	127	121	
• • • •	121	127	121	130	127	121	

Liftback	121	127	121	130	127	121
Estate	118	124	118	127	124	118
FUEL CONSUMPTION	1.6L	1.8L	1110	2.0L D4	127	2.0L D4D
TOLL GOILGOIM TIGH	5 M/T	5 M/T	4 A/T	5 M/T	4 A/T	5 M/T
Saloon	O IVI/ I	0 101/ 1	7771	O IVI/ I	7771	O IVI/ I
	00.0	00.0	04.0	00.7	00.0	47.0
Combined	39.8	38.2	34.9	36.7	33.2	47.9
Extra Urban	49.6	47.1	44.1	46.3	42.2	58.9
Urban	29.7	28.5	25.7	26.6	24.1	35.3
Liftback		200	24.0			4= 0
Combined	39.8	38.2	34.0	36.7	33.2	47.9
Extra Urban	49.6	47.1	43.5	46.3	42.2	58.9
Urban	29.7	28.5	25.2	26.6	24.1	35.3
Estate						
Combined	38.2	37.2	33.6	35.8	32.5	47.9
Extra Urban	47.1	45.6	41.5	44.8	40.9	56.5
Urban	29.1	28.2	25.0	26.2	23.9	35.3
DIMENSIONS (exterior)	Saloon		Liftback			tate
Overall length (mm)	4520		4520		46	
Overall width (mm)	1710		1710		17	
Overall height (mm)	1425		1425			00 (without roof
					rail	
Interior length (mm)	1930		1930		19	30
Interior width (mm)	1455		1455		14:	
Interior height (mm)	1160 w/o s			o sunroof	1	70 w/o sunroof
	1110 w/sur	roof	110 w/s	unroof	11:	20 w/sunroof
Wheelbase (mm)	2630		2630		26	30
Tread width (mm) front	1480		1480		148	80
Tread width (mm) rear	1450		1450		14:	50
Minimum turning radius (m)	5.8					
Fuel Tank capacity (L)	60L					
WEIGHTS (kg)	1.6L	1.8L		2.0L D4		2.0L D4D
Kerb weight						
Saloon	1200/1280	1200/	1315	1245/13	345	1320/1395
Liftback	1220/1300	1220/	1335	1265/13	365	1340/1415
Estate	1235/1315	1235/	1350	1280/13	380	1355/1430
Gross vehicle weight	1730	1760		1800		1830
SUSPENSION		,		,		•
Front		MacPhe	erson stru	ıt		
Rear		Dual-Lir				
BRAKES						
Front		Ventilat	ed Disc			
Rear		Solid Di				
STEERING						
Type		Rack ar	nd pinion			
Ratio		15.7	,			
Turns (lock to lock)		3				
TYRES AND WHEELS						
Wheel size		15"/16"				
Tyre size: S,GS,GLS		195/60	R15			
Tyre size: 0,00,000		205/55				
1,10 3,20. 35%		200,00				
		<u> </u>				

TOYOTA AVENSIS EQUIPMENT SPECIFICATIONS

SAFETY	S	VERMONT	GS	SR	GLS	CDX
Driver's airbag	✓	✓	√	√	√	√
Front passenger airbag	✓	√	✓	√	√	✓
Driver and front passenger seat-mounted	✓	√	√	√	√	✓
side airbags						
Electronic front seatbelt pretensioners with	✓	√	√	√	✓	√
force limiter						
Five 3-point seatbelts with emergency	✓	√	√	√	√	✓
locking retractor						
Rear seatbelts with automatic locking	√	√	✓	√	✓	√
retractor						
Height-adjustable front seatbelts	√	✓	√	✓	✓	✓
Adjustable front headrests	√	✓	√	✓	✓	✓
Three rear headrests	✓	√	√	√	√	✓
ABS with Electronic Brakeforce Distribution	✓	√	√	√	√	✓
Vehicle Stability Control with Traction	×	×	×	√	2.0	2.0
Control and Brake Assist					VVT-i	VVT-i
Disc brakes (front ventilated discs)	✓	√	√	√	√	✓
Energy-absorbing, deformable, retracting	✓	√	√	√	√	✓
steering column						
Decoupling brake mechanism	✓	√	√	√	√	✓
Side impact pipe beams on all side doors	√	√	√	√	√	✓
Head impact protection structure in roof side	✓	√	√	√	√	✓
and pillar						
Anti-submarining seats	✓	√	√	✓	✓	√
Reinforced rear seat back with engagement	✓	√	√	√	√	✓
warning		·				
Partition net and load cover (estate only)	✓	×	√	×	√	✓
Outside temperature display	✓	√	√	√	√	✓
Energy-absorbing front and rear crumple	✓	√	√	√	√	✓
zones						
High-integrity cabin structure	✓	✓	✓	✓	✓	✓
Child-proof rear door locks	√	✓	✓	✓	✓	✓
Anti-trap driver's window function	✓	✓	✓	✓	✓	✓
Anti-trap sunroof auto-close function	×	×	×	×	×	✓
High-mounted stop lamp	√	✓	✓	✓	√	✓
Auto-cancelling rear fog lamp	√	✓	✓	✓	√	✓
INSTRUMENTS & CONTROLS	S	VERMONT	GS	SR	GLS	CDX
Tachometer	✓	✓	✓	✓	✓	✓
Outside temperature display	✓	✓	✓	✓	✓	✓
Trip computer	✓	✓	✓	✓	✓	✓
Twin-speed and variable intermittent	√	✓	✓	✓	✓	✓
windscreen wipers						
Intermittent and continual sweep rear	✓	✓	✓	✓	✓	✓
wash/wiper (Liftback and estate)						
VSC override switch and slip warning lamp	×	×	×	✓	2.0	2.0
			,		VVT-i	VVT-i
Fuel gauge with low fuel warning and fuel	✓	✓	✓	✓	✓	✓
cap indicator						
Digital clock in multi-information display	√	✓	√	√	√	√
Electronic headlamp levelling	√	√	√	√	√	√
Water temperature gauge	√	✓	✓	✓	√	✓
Rear fog lamp indicator	✓	✓	✓	✓	√	✓
Front fog lamp indicator	×	×	×	✓	✓	✓

"Lights on" warning buzzer COMFORT & CONVENIENCE	✓	✓	✓	✓	✓	✓
COMFORT & CONVENIENCE	✓	✓	✓	✓	✓	✓
John Oll & John Little	S	VERMONT	GS	SR	GLS	CDX
Power-assisted steering	✓	✓	✓	✓	✓	✓
Electric front windows	✓	✓	✓	✓	✓	✓
Electric front and rear windows	×	×	×	✓	✓	✓
Driver's window one-touch up and anti-trap	✓	✓	✓	✓	✓	✓
functions						
Central double locking with remote activation	✓	✓	✓	✓	✓	✓
Power-adjustable door mirrors	✓	✓	✓	✓	✓	✓
Heated power-adjustable door mirrors			✓	✓	✓	\checkmark
Stepless tilt-adjustable steering column	✓	✓	✓	✓	✓	✓
Green-tinted glass	✓	✓	✓	✓	✓	✓
Dark-tinted rear side privacy glass	×	×	*		✓	✓
Twin sun visors	✓	✓	✓	✓	✓	✓
Driver and front passenger vanity mirrors	✓	✓	✓	✓	✓	✓
with cover						
Variable blue instrument illumination	✓	✓	✓	✓	✓	✓
Remote courtesy light operation with delay	✓	✓	✓	✓	✓	✓
Key-off function to close power roof and	✓	✓	✓	✓	✓	✓
windows						
Ashtray and illuminated cigar lighter	✓	✓	✓	✓	✓	✓
Front and rear assist grips, with coat hook	✓	✓	✓	✓	✓	✓
Heated rear window	✓	✓	✓	✓	✓	✓
Fully carpeted boot	✓	✓	✓	✓	✓	✓
Luggage load hooks in boot	✓	✓	✓	✓	✓	✓
Interior tailgate pull handle	✓	✓	✓	✓	✓	✓
Remote fuel lock release	✓	✓	✓	✓	✓	✓
AUDIO	S	VERMONT	GS	SR	GLS	CDX
Integrated, unique-fit audio with separate	✓	✓	✓	✓	✓	✓
display						
Centre-mounted multi-information display	√					
Centre-mounted multi-mormation display	•	✓	✓	✓	✓	✓
Contro modifica main information display		✓ Opt	√	✓ Opt	✓ ✓	✓ ✓
Contro modifica main information display	Opt	•				
GPS navigation system (supplied with UK (•				
GPS navigation system (supplied with UK CD-ROM)	Opt	Opt	√	Opt	√	✓
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets	Opt	Opt ✓	√	Opt ✓	✓ ✓	✓ ✓
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings	Opt ✓	Opt ✓	✓ ✓ ✓	Opt ✓ ✓	✓ ✓ ✓	√ √ √
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player	Opt ✓ ✓	Opt ✓ Opt	✓ ✓ ✓ ✓ Opt	Opt ✓ Opt	✓ ✓ ✓ Opt	✓ ✓ ✓ ×
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search	Opt ✓ ✓	Opt ✓ Opt	✓ ✓ ✓ ✓ Opt	Opt ✓ Opt	✓ ✓ ✓ Opt	✓ ✓ ✓ ×
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player	Opt ✓ ✓ ✓	Opt V Opt Opt x	✓ ✓ ✓ ✓ Opt ×	Opt ✓ Opt ×	✓ ✓ ✓ ✓ Opt ×	✓ ✓ ✓ ✓ × ✓
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player	Opt ✓ ✓ ✓ ✓ ✓	Opt V Opt Opt	✓ ✓ ✓ ✓ Opt *	Opt V Opt x	✓ ✓ ✓ ✓ Opt × ✓	√
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player Boot-mounted 6-disc CD autochanger	Opt ✓ ✓ ✓ × Opt Opt	Opt V Opt Opt v Opt	✓ ✓ ✓ Opt ✓ Opt	Opt ✓ Opt × Opt	✓ ✓ ✓ Opt × Opt	✓ ✓ ✓ × ✓ ✓ × ✓ ✓
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player Boot-mounted 6-disc CD autochanger 2 front speakers 2 rear speakers	Opt ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	Opt / Opt / Opt / Opt / Opt	✓ ✓ ✓ Opt ✓ Opt ✓	Opt V Opt V Opt V Opt V	✓ ✓ ✓ Opt × Opt ✓ Opt ✓	<pre></pre>
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player Boot-mounted 6-disc CD autochanger 2 front speakers 2 rear speakers 2 high-frequency tweeters in A-pillar	Opt V V X Opt Opt Opt V V V V V V V V V V V V V V V V V V V	Opt Opt Opt Opt Opt Opt ✓	✓ ✓ ✓ Opt x Opt ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	Opt Opt Opt Opt Opt ✓	✓ ✓ ✓ Opt × Opt ✓ ✓	✓ ✓ ✓ × ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player Boot-mounted 6-disc CD autochanger 2 front speakers 2 rear speakers	Opt V V X Opt Opt V V X	Opt Opt Opt Opt Opt Opt x	✓ ✓ ✓ Opt × Opt ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	Opt V Opt V Opt V Opt V	✓ ✓ ✓ ✓ Opt × ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	<pre></pre>
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player Boot-mounted 6-disc CD autochanger 2 front speakers 2 rear speakers 2 high-frequency tweeters in A-pillar Steering wheel-mounted audio controls Separate remote control unit	Opt Opt Opt Opt x x	Opt Opt Opt Opt Opt Opt	✓ ✓	Opt V Opt V Opt V Opt V V V	✓ ✓ ✓ ✓ Opt × ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	<pre></pre>
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player Boot-mounted 6-disc CD autochanger 2 front speakers 2 rear speakers 2 high-frequency tweeters in A-pillar Steering wheel-mounted audio controls	Opt Opt Opt Opt x x x	Opt Opt Opt Opt V Opt V X X X	✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	Opt V Opt V Opt V Opt V V V V X	✓ ✓ ✓ ✓ Opt × ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ×	<pre></pre>
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player Boot-mounted 6-disc CD autochanger 2 front speakers 2 rear speakers 2 high-frequency tweeters in A-pillar Steering wheel-mounted audio controls Separate remote control unit Flexible, removable, roof-mounted radio	Opt Opt Opt Opt x x x	Opt Opt Opt Opt V Opt V X X X	✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	Opt V Opt V Opt V Opt V V V V X	✓ ✓ ✓ ✓ Opt × ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ×	x x √ √ √ √ √ √ √ √ √ √ √ √ ✓ ✓
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player Boot-mounted 6-disc CD autochanger 2 front speakers 2 rear speakers 2 high-frequency tweeters in A-pillar Steering wheel-mounted audio controls Separate remote control unit Flexible, removable, roof-mounted radio aerial	Opt Opt Opt Opt x x x	Opt Opt Opt Opt Opt x Opt x x x	✓ ✓ ✓ Opt × Opt ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	Opt V Opt V Opt V V V V V V	✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player Boot-mounted 6-disc CD autochanger 2 front speakers 2 rear speakers 2 high-frequency tweeters in A-pillar Steering wheel-mounted audio controls Separate remote control unit Flexible, removable, roof-mounted radio aerial VENTILATION	Opt Opt Opt Opt x S	Opt / Opt / Opt / Opt / V Opt / V VERMONT	✓ ✓ ✓ Opt ✓ Opt ✓ ✓ ✓ Opt ✓ ✓ ✓ Opt ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	Opt V Opt V Opt V V V SR	✓ ✓	✓
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player Boot-mounted 6-disc CD autochanger 2 front speakers 2 rear speakers 2 high-frequency tweeters in A-pillar Steering wheel-mounted audio controls Separate remote control unit Flexible, removable, roof-mounted radio aerial VENTILATION Automatic air conditioning (climate control)	Opt Opt Opt Opt x S x	Opt Opt Opt Opt Opt V Opt V VERMONT	✓ ✓ ✓ ✓ Opt × ✓ Opt ✓ ✓ ✓ ✓ GS ✓	Opt ✓ ✓ Opt ✓ ✓ Opt ✓ ✓ SR ✓	✓ ✓	✓
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player Boot-mounted 6-disc CD autochanger 2 front speakers 2 rear speakers 2 high-frequency tweeters in A-pillar Steering wheel-mounted audio controls Separate remote control unit Flexible, removable, roof-mounted radio aerial VENTILATION Automatic air conditioning (climate control) Electric tilt/slide glass sunroof	Opt Opt Opt Opt x S x x	Opt Opt Opt Opt Opt V Opt V V V V V V V V V V X V V	✓ ✓ ✓ ✓ Opt ✓ ✓ ✓ Opt ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	Opt ✓ ✓ Opt ✓ ✓ Opt ✓ ✓ SR ✓ ×	✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	✓ ✓ × ✓ ✓ ✓ × ✓ ✓ ✓ ✓ ✓ ✓ ✓
GPS navigation system (supplied with UK CD-ROM) AM/FM radio with 24 presets RDS with PTY and EON settings Cassette player Logic control cassette player with automatic music search Single-disc CD player Boot-mounted 6-disc CD autochanger 2 front speakers 2 rear speakers 2 high-frequency tweeters in A-pillar Steering wheel-mounted audio controls Separate remote control unit Flexible, removable, roof-mounted radio aerial VENTILATION Automatic air conditioning (climate control) Electric tilt/slide glass sunroof Electronic air recirculation function	Opt Opt Opt Opt x S x x	Opt Opt Opt Opt Opt V Opt V V V V V V V V V V V V V	✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	Opt ✓ ✓ Opt ✓ ✓ Opt ✓ ✓ SR ✓ ✓	✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓ ✓	✓ ✓ × ✓ ✓ ✓ × ✓ ✓ ✓ ✓ ✓ ✓ ✓

SECURITY	S	VERMONT	GS	SR	GLS	CDX
Transponder key engine immobiliser	✓	✓	✓	✓	✓	✓
Remote alarm with perimeter and microwave	×	×	√	✓	✓	✓
interior protection						
Steering column lock	✓	✓	✓	✓	✓	✓
Double-locking	✓	✓	✓	✓	✓	✓
Integrated unique-fit audio with remote	✓	✓	✓	✓	✓	✓
display						
Locking wheel nuts	×	✓	×	✓	✓	✓
Security window etching linked to 24-hour	✓	✓	✓	✓	✓	✓
helpline						
SEATING, UPHOLSTERY & TRIM	S	VERMONT	GS	SR	GLS	CDX
Driver and front passenger seat recline and	✓	✓	✓	✓	✓	✓
slide adjustment						
Driver's seat height adjustment	✓	✓	✓	✓	✓	✓
Driver's seat lumbar support	✓	✓	✓	✓	✓	✓
Rear armrest with integrated cupholders and	✓	✓	✓	✓	✓	✓
storage tray						
Grasmere velour upholstery	✓	✓	×	×	×	*
Patterdale velour upholstery	×	×	✓	√	×	*
Langdale velour upholstery	×	*	×	×	✓	*
Illinois leather upholstery	×	*	×	×	×	✓
Leather steering wheel and gear shift cover	×	*	×	×	✓	✓
Metallic-effect centre console and ventilation	✓	✓	✓	✓	×	×
surround						
Wood-effect centre console and ventilation	×	*	×	*	✓	✓
surround						
60/40 split rear seat back (plus seat cushion	✓	✓	✓	✓	✓	✓
on liftback and estate)	•	VEDMONT	00	CD	010	CDV
STORAGE Large-capacity glovebox	S ✓	VERMONT ✓	GS	SR ✓	GLS ✓	CDX ✓
• • •	✓	V ✓	✓	▼	✓	✓
Front seatback pocket	✓	V ✓	✓	√	✓	✓
Lidded storage box in door armrest Centre tunnel storage box (with 8-CD	√	✓	✓	✓	✓	✓
capacity)	•	•	•	•	•	•
Underseat storage net (passenger side)	√	✓	√	✓	✓	√
Overhead storage box with sunglasses	· ✓	✓	· ✓	✓	<i>'</i>	✓
holder	,	,	,			,
Front and rear cupholders	√	√	√	√	√	✓
EXTERIOR & BODY	S	VERMONT	GS	SR	GLS	CDX
Side protection moulding	√	√	√	√	✓	✓
Body-coloured door handles and mirrors	×	×	×	✓	✓	✓
Mesh sports front grille	×	*	×	✓	×	*
Colour-keyed rear spoiler	×	×	×	✓	×	×
Roof rails (estate only)	✓	×	✓	×	✓	✓
Front fog lamps	×	*	×	✓	✓	✓
		1			.	√
	×	×	✓	✓	✓	✓
Mudflaps		*	✓ ✓	√ ×	×	*
Mudflaps 15in wheels with full wheelcaps	×			-		•
Mudflaps 15in wheels with full wheelcaps 15in alloy wheels with locking wheel nuts	× ✓	×	√	×	×	*
Mudflaps 15in wheels with full wheelcaps	× √ ×	x ✓	×	×	× ✓	×