INSTRUCTION MANUAL

& REFERENCE GUIDE

Welcome to Serpent

The Serpent Viper 977e is based on the successful 977 Viper gaspowered car, combining ultimate performance into a single package. The 265mm wide electric powered racing car offers superb handling, incredible accelleration and top-speed. Breath taking !

The Serpent Viper 977e is designed to be a world champion, while still being easy to use, assemble, and set up. You are now part of the worldwide network of Serpent drivers, which gives you superior technical support and access to many benefits that only Serpent drivers can enjoy.

The Serpent Viper 977e offers state of the art specifications and leads the way in chassis design, using all the knowledge we have from 1/8 scale racing into this design too. Continuously pushing the performance envelope, Serpent's engineers have added many new and innovative features that can help take your Serpent Viper 977e into the winner's circle.

INSTRUCTIONS

Serpent's long tradition of excellence extends to their instruction manuals, and this instruction manual is no exception. The easy-to-follow layout is richly illustrated with 3D-rendered full-color images to make your building experience quick and easy. Following the instructions will result in a well-built, high-performance racecar that will soon be able to unleash its full potential at the racetrack.

This instruction manual has been divided into sections that will logically lead you through the assembly process of your Serpent model. Follow the assembly steps in the order presented to ensure that no problems occur during assembly. Each step indicates all the fasteners and small parts used. Bag numbers identify the kit bag(s) that contains the appropriate parts.

EXPLODED VIEWS AND PARTS LIST

The exploded views and parts lists for the Serpent Viper 977e are included in the back of this manual. The exploded views show all the parts of a particular assembly step along with the Serpent part number. The parts lists indicate the part number and name of each part for easy reference when ordering.

The instruction manual included with your Serpent Viper 977e kit is very complete, though due to continuous product development, more up-to-date information may be provided at our Serpent.com website.

All information about the Serpent Viper 977e is accessible from the Serpent 977-e product page which can be found on Serpent.com and can be accessed by simply typing www.serpent.com/904002 into your web browsers address bar.

From the Serpent Viper 977e product page you will find the very latest information about your Serpent Viper 977e: reports by team drivers and other experts, tips and tricks, setups, image gallery and downloadable files including the latest version of the instruction manual will be made available as downloadable **PDF-files.**

Enjoy racing!

Team Serpent

SAFETY

Read and take note of the 'Read this First section' before proceeding to assemble the car-kit. This car-kit is intended for persons aged 16 or older.

CUSTOMER SERVICE

Serpent has made a strong effort to make this manual as complete and clear as possible.

Additional info may be published in our website: www.serpent.com or you may ask your dealer or the Serpent distributor for advice, or email Serpent direct: info@serpent.com

The Serpent Facebook, Twitter and Youtube pages give additional means of support and communications.

INSTRUCTIONS, HOW TO USE

The kit includes bags, with bagnumbers, which refer to the same step in the manual. Open only the indicated bag(s) per step and finish that part of the assembly.

Remaining parts will be needed lateron in the assembly process.

SETUP

In many assembly steps you mount specific parts that suit the default set-up. We advice to keep the seperate default set-up sheet alongside the manual, during all assembly.

Other finetuning of the set-up, must be done at the track.

CONTENTS

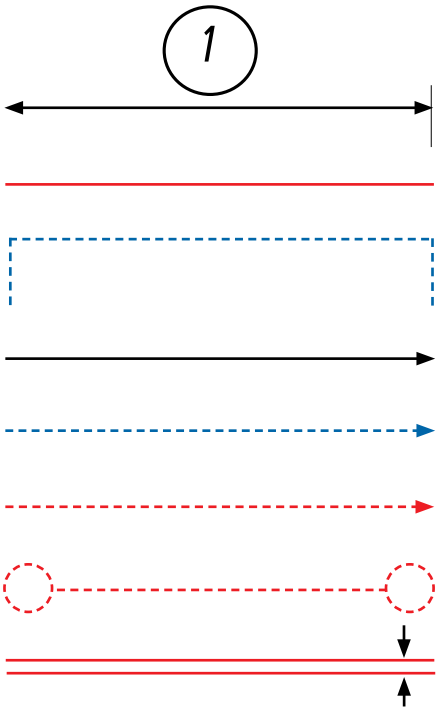
TRANSMISSION ASSEMBLY	**4**
REAR ASSEMBLY	**8**
STEERING & FRONT ASSEMBLY	**11**
SHOCKS ASSEMBLY	**17**
FINAL ASSEMBLY	**18**
REFERENCE GUIDE	**22**
PARTS LISTS	**29**

Read this first!

- This is a highly technical hobby product, intended to be used in a safe racing environment. This car is capable of speeds in excess of 80 km/h or 50mph. Please follow these guidelines when building and operating this model.
- Parental guidance is required when the builder/user of this car is under 16.
- Follow the building instructions. If in doubt, contact your dealer or importer.
- Be sure to use the proper tools when assembling the car. Always exercise caution when using electric tools, knives and other sharp objects.
- Be careful when using liquids like lubrication oil, fuel or glue. Do not swallow.
- Follow the manufacturer's instruction in case you experience irritation after using the product.
- Be careful when operating the car. Stay away from any rotating parts such as wheels, gears and transmission. Stay away from motor, engine and exhaust pipe system or speedo during and immediately after use, as these parts may be very hot. We advise to use protective hand cloves.
- Only operate this car in a safe environment, like a special racing track or a closed parking lot. Avoid using this car on public roads, crowded places or near infants.
- Before operating this car, always check the mechanical status of the car. Also check that the transmitter and receiver frequencies correspond and are not used by any other racer at the same time. Check that the batteries of the transmitter and receiver are fully charged.
- After use, always check all the mechanics of the car. We advise to clean the car immediately after use, and inspect the parts for wear or fractures. Replace when necessary. Do not use water, methanol, thinner or other solvents to clean the car.
- Empty the fuel tank (depending on model) if needed and disconnect the receiver battery.
- Store the car in a dry and heated place to avoid corrosion of metal parts.
- Avoid using this car in wet conditions as the water will cause corrosion on the metal parts and bearings and these parts will cease to function properly. If driven in the wet, ensure that all the electric equipment is waterproofed and after use, that all moving parts are dried immediately.

USING THE MANUAL

Each step contains a variety of numbers, lines, and symbols. The numbers represent the order in which the parts should be assembled. The lines and symbols are described below.



Step number; the order in which you should assemble the indicated parts

Length after assembly

Assembly path of one item into another

Group of items (within lines) should be assembled first

Direction the item should be moved

Glue one item to another

Press/Insert one item into another

Connect one item to another

Gap between two items

Apply graphite grease (Grey),

Apply threadlock (Blue),

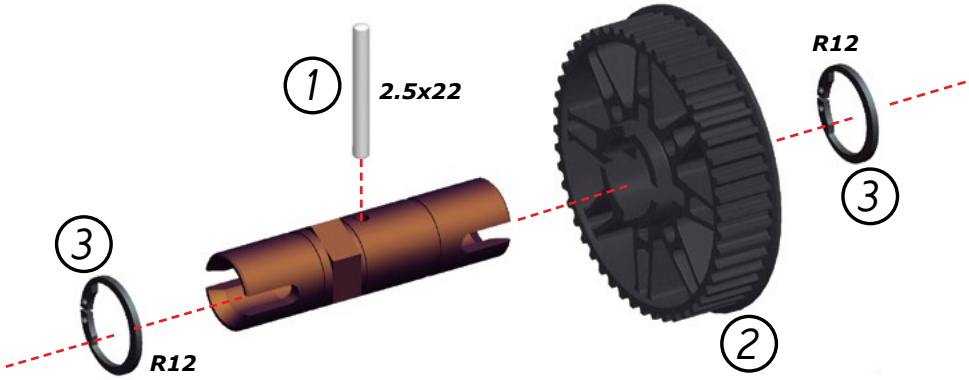
Apply silicone grease (Orange),

Apply silicone oil,

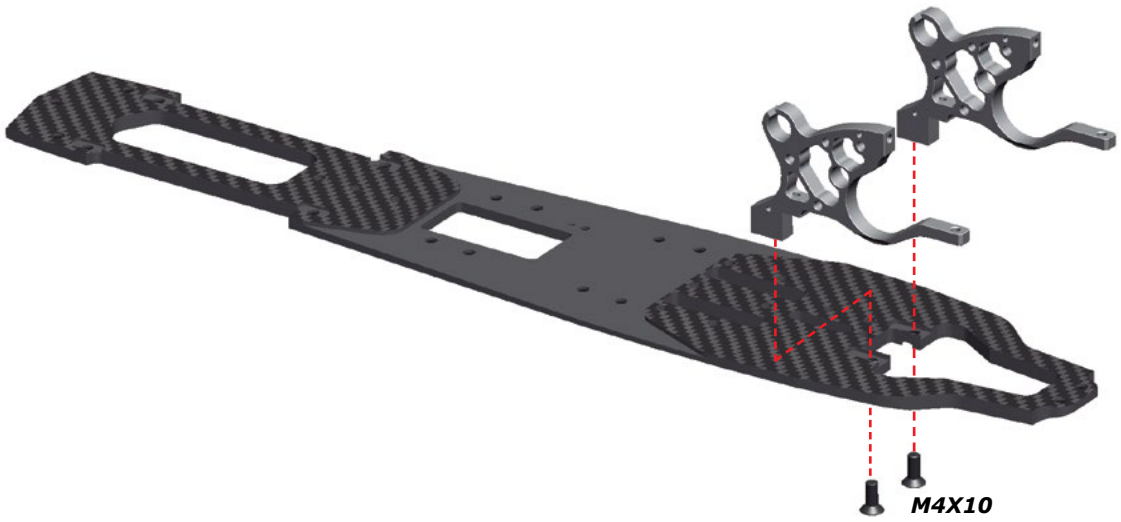
TRANSMISSION ASSEMBLY

STEP 1

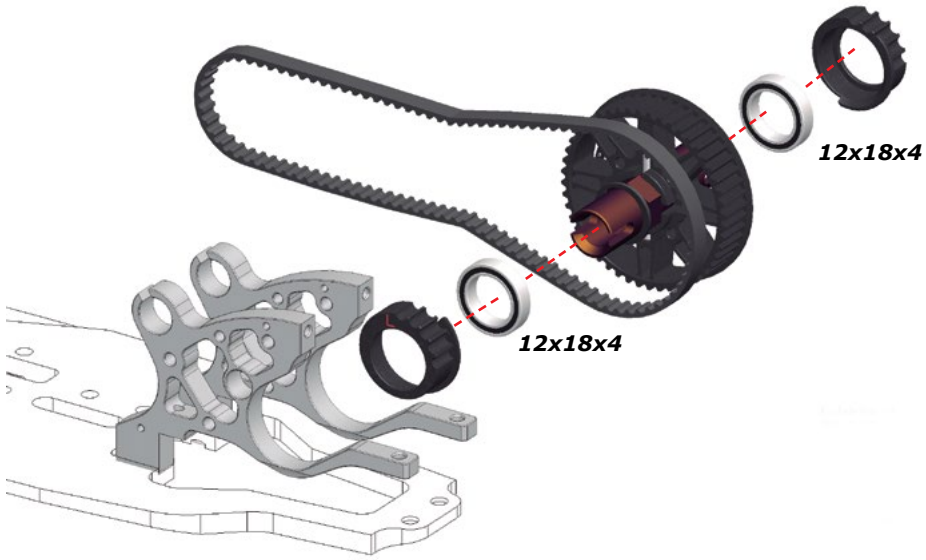
Bag 1



STEP 2



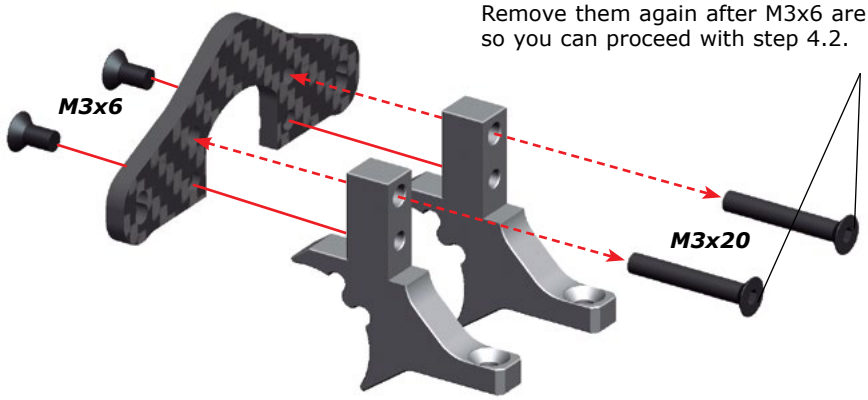
STEP 3



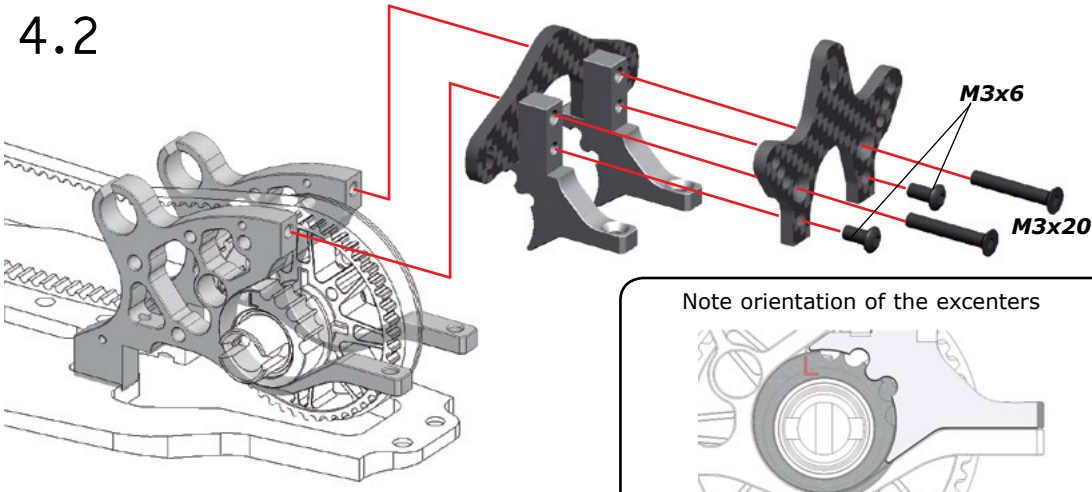
STEP 4

4.1

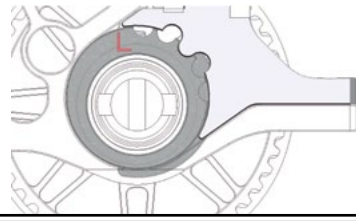
Note:
Assemble M3x20 screws to aling the camber bracket.
Remove them again after M3x6 are mounted, so you can proceed with step 4.2.



4.2

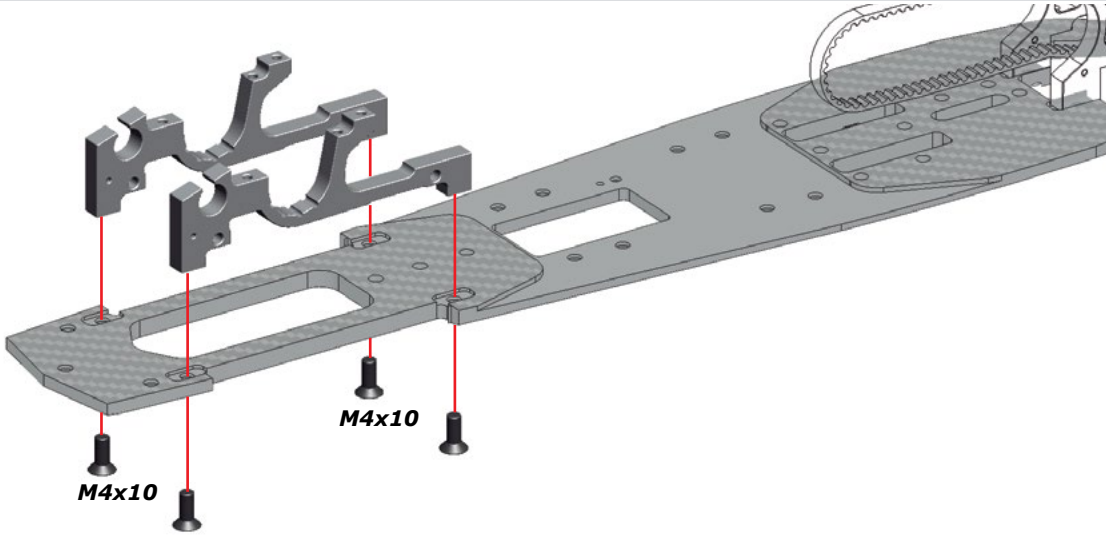


Note orientation of the excenters

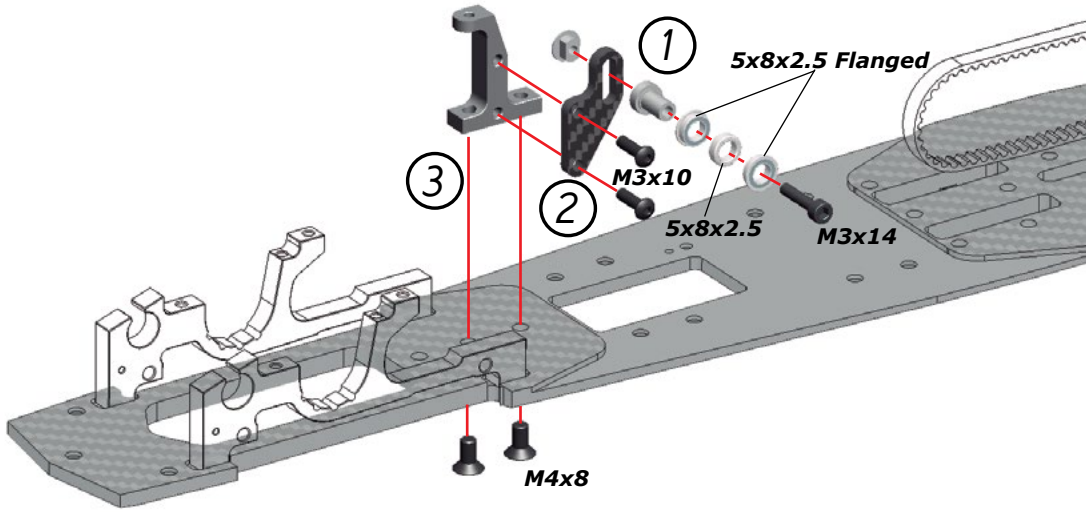


STEP 5

Bag 2

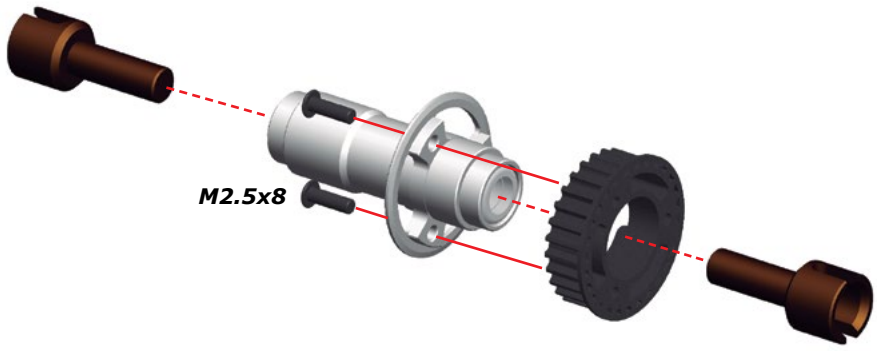


STEP 6

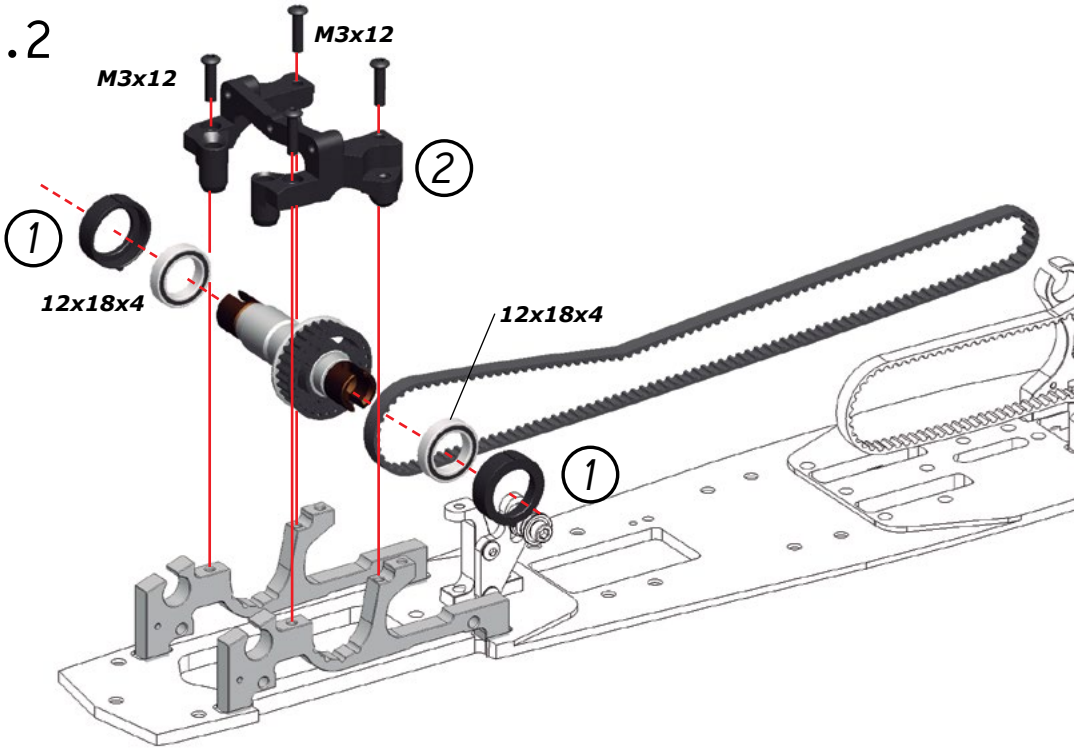


STEP 7

7.1

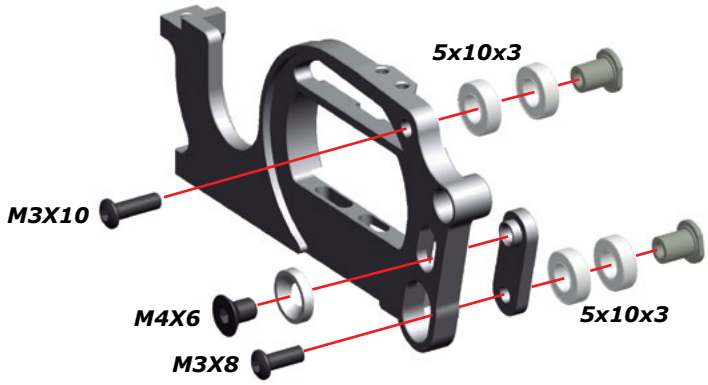


7.2



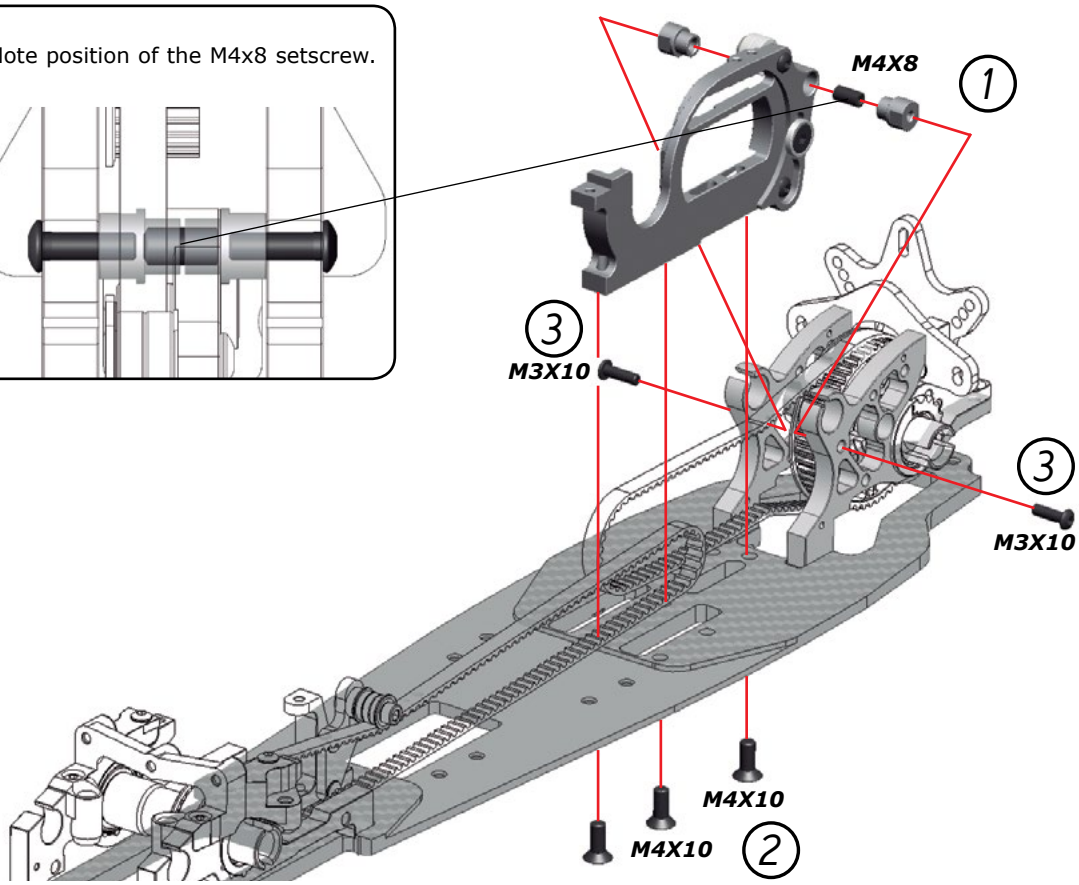
STEP 8

Bag 3

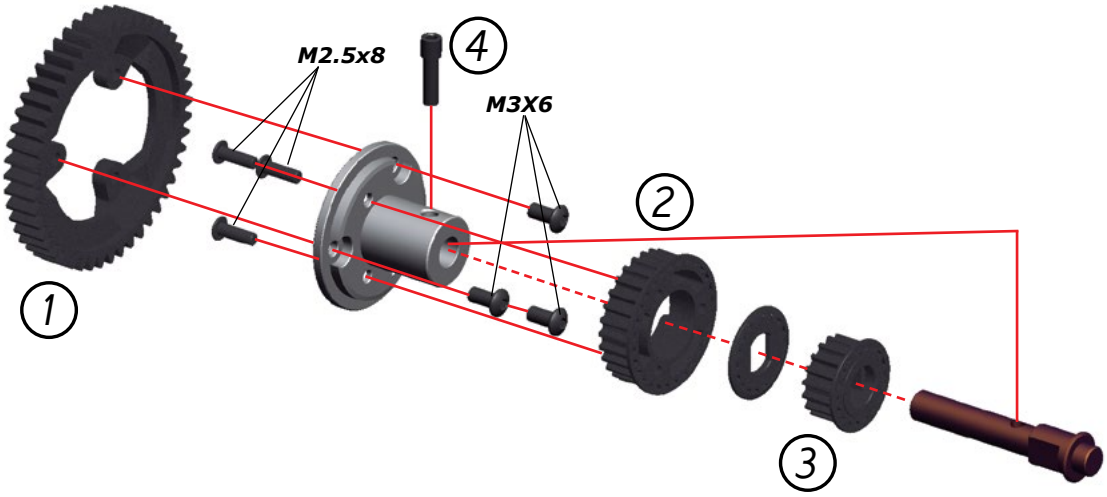


STEP 9

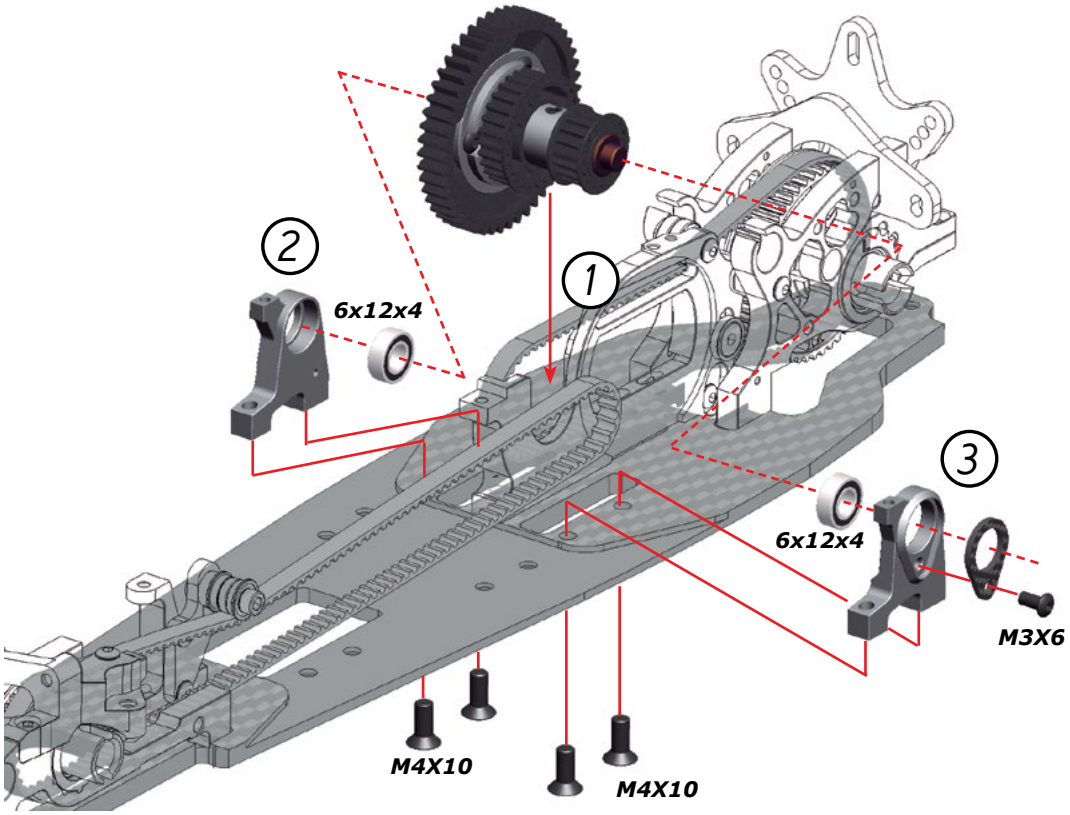
Note position of the M4x8 setscrew.



STEP 10



STEP 11



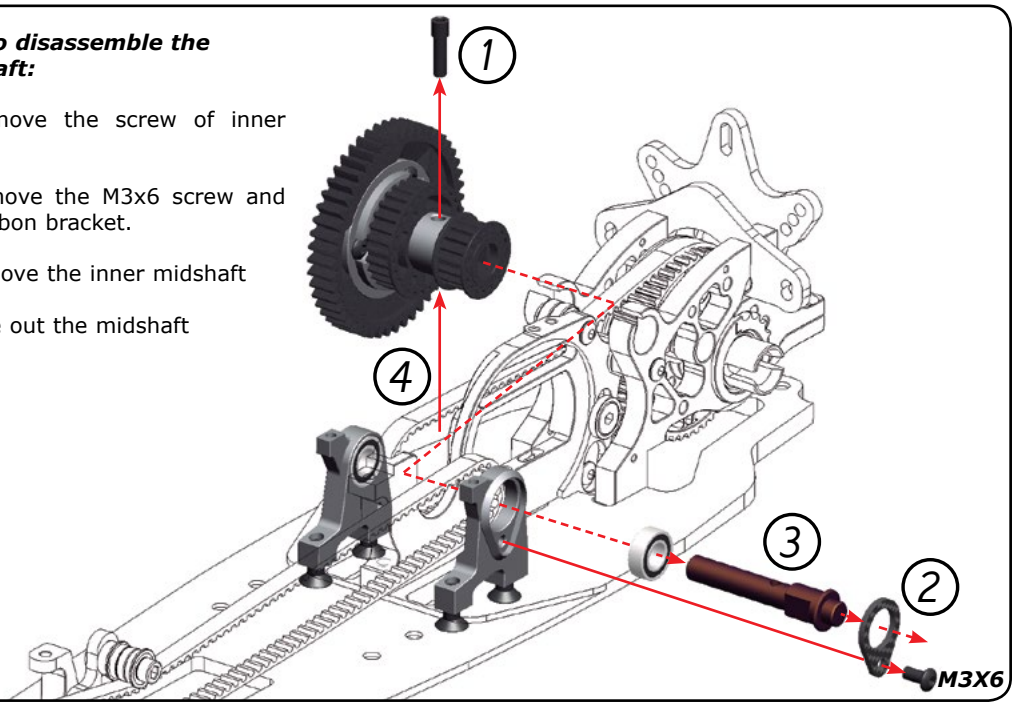
How to disassemble the midshaft:

1) Remove the screw of inner shaft.

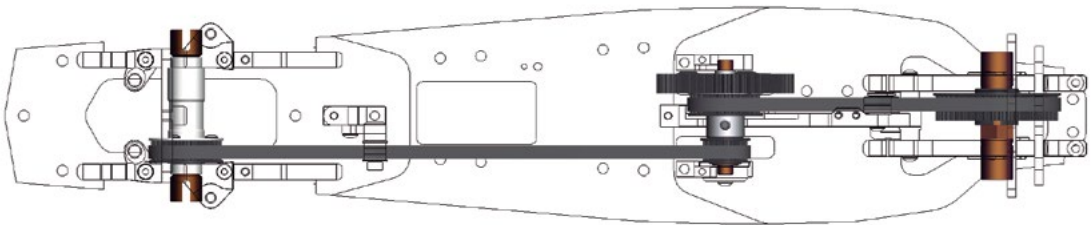
2) Remove the M3x6 screw and the carbon bracket.

3) Remove the inner midshaft

4) Take out the midshaft



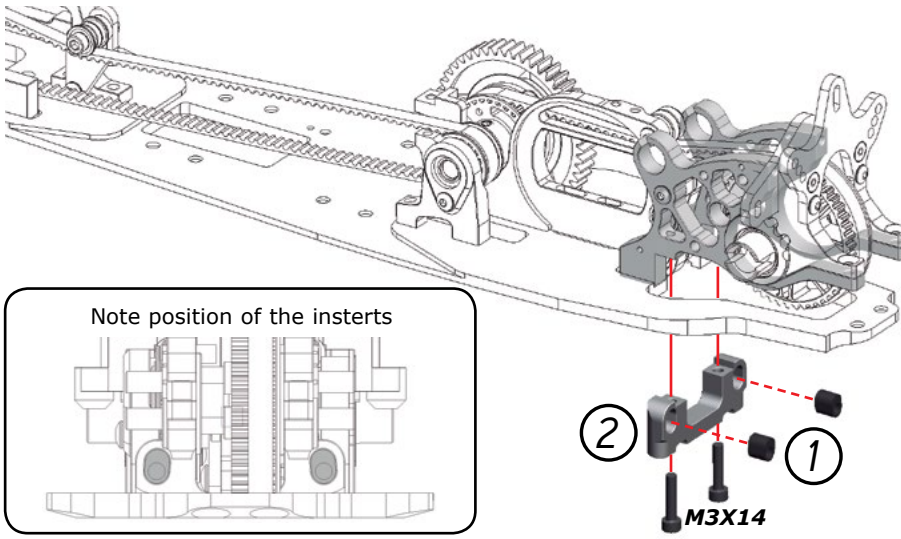
Detail view of the 977e Viper ***Two Belts Transmission***



REAR ASSEMBLY

STEP 12

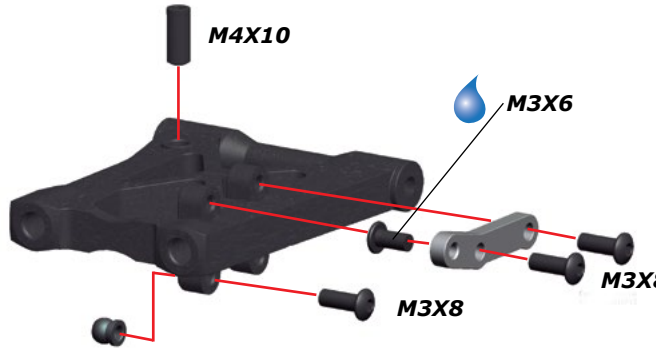
Bag 4



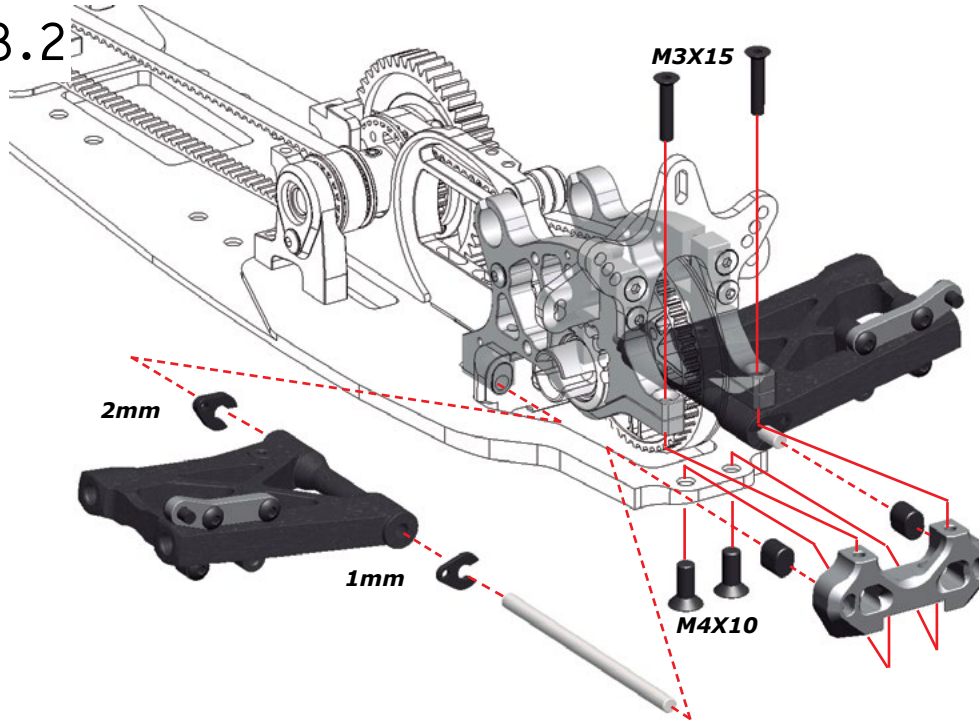
Note position of the insterts

STEP 13

13.1

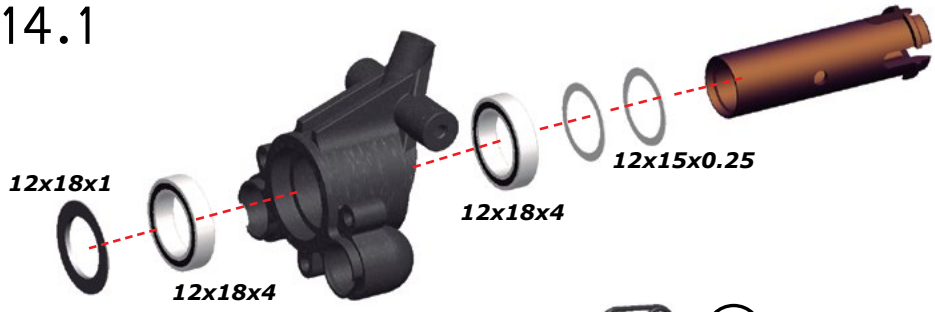


13.2

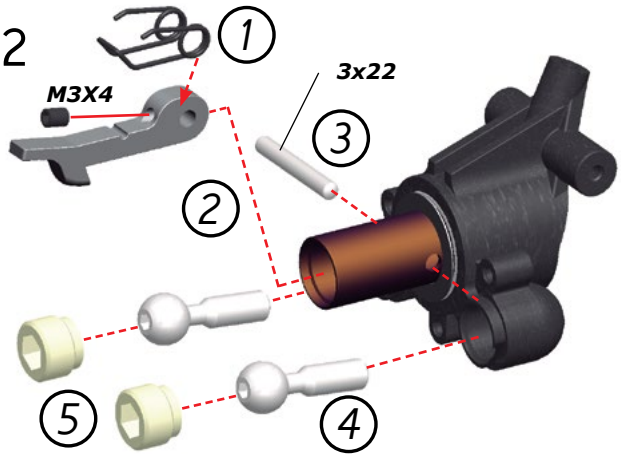


STEP 14

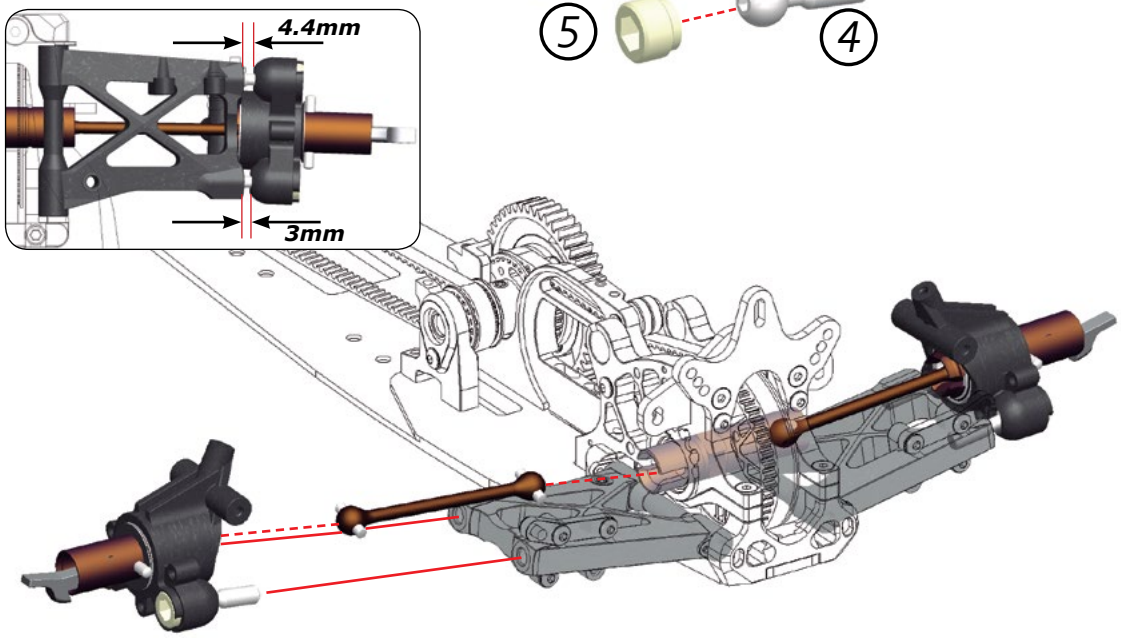
14.1



14.2

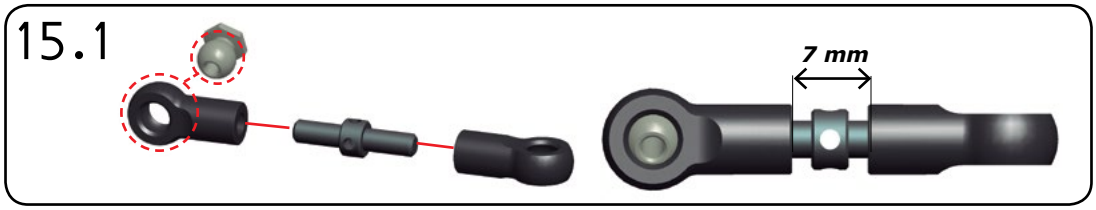


14.3

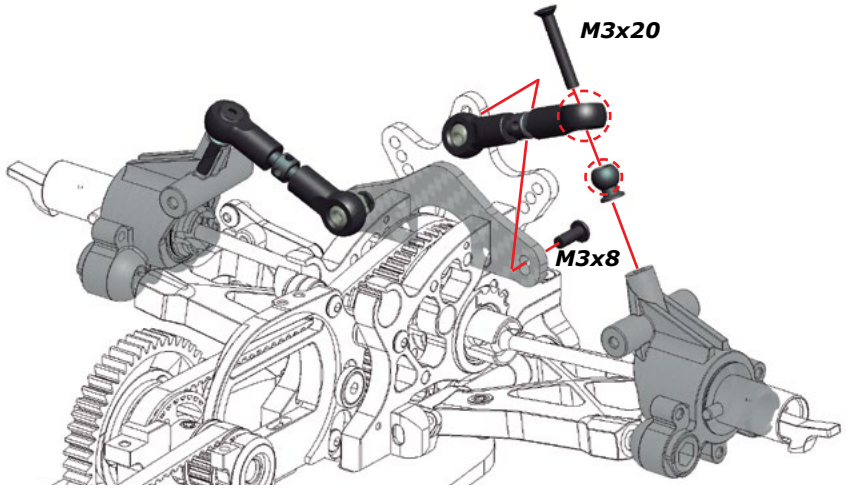


STEP 15

15.1

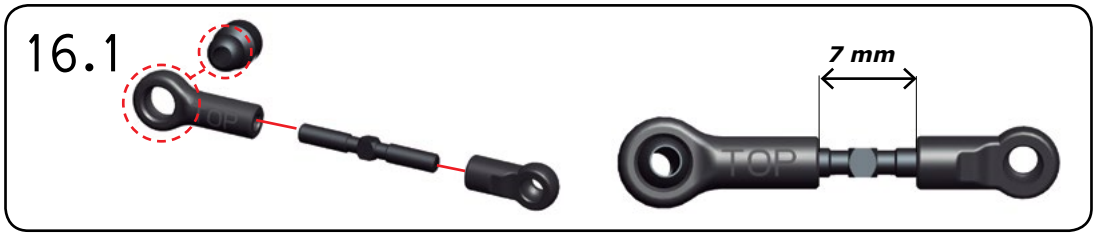


15.2

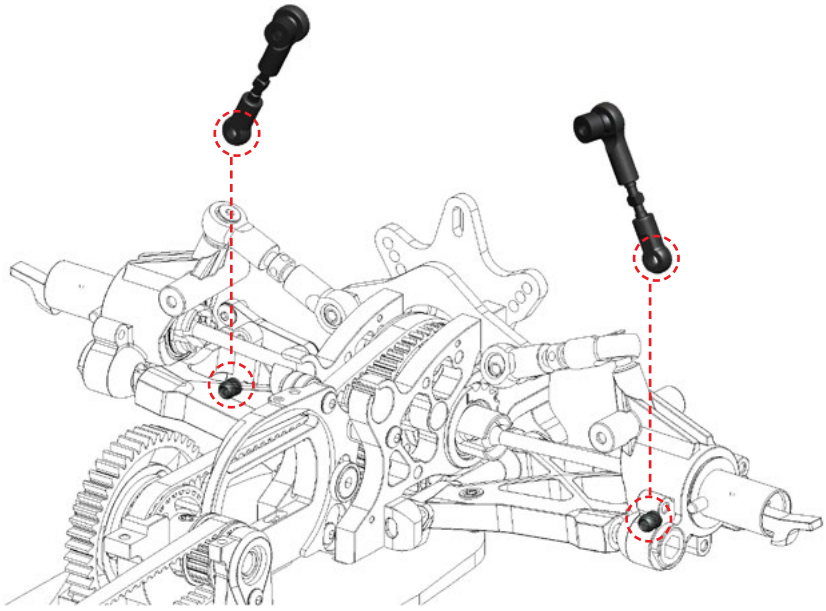


STEP 16

16.1

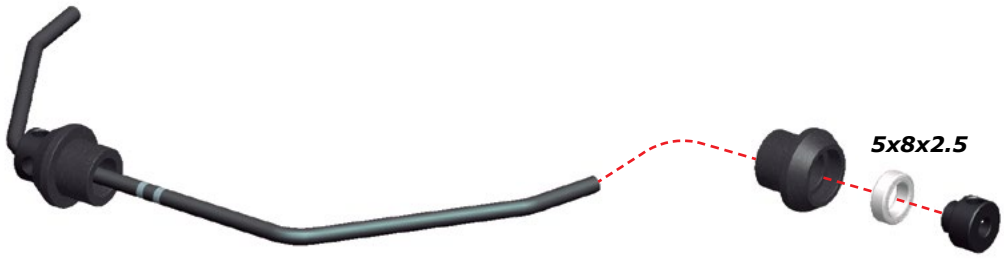


16.2

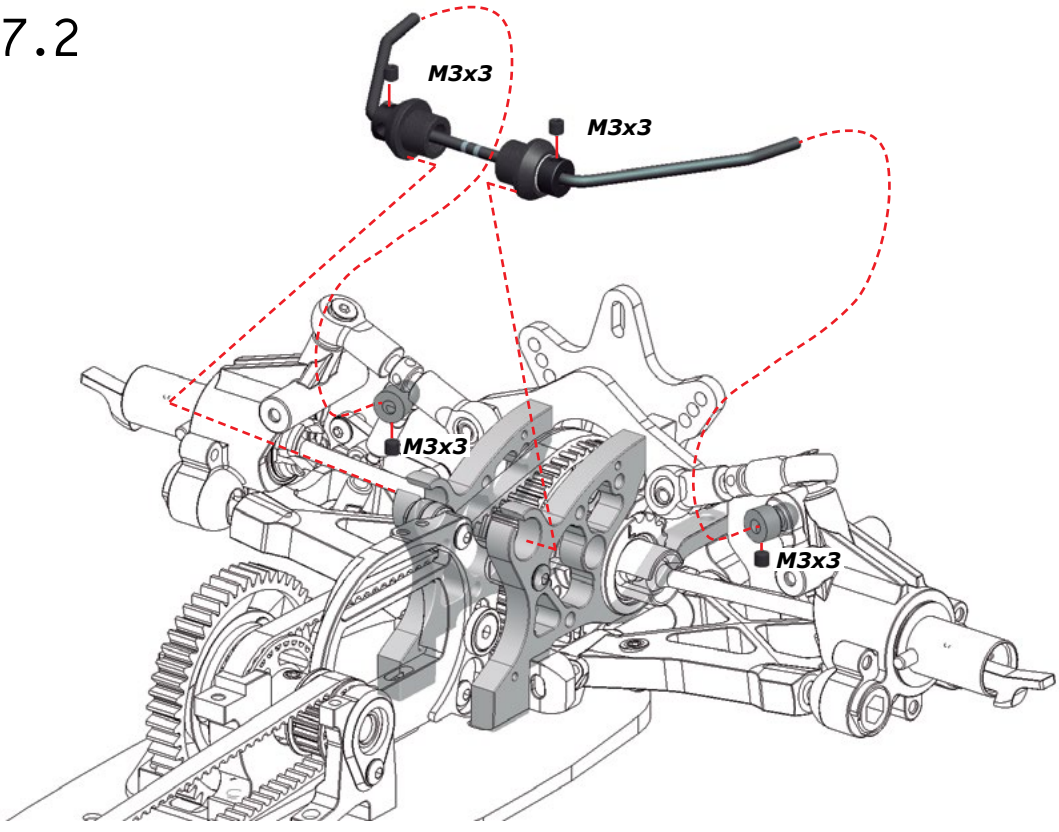


STEP 17

17.1



17.2



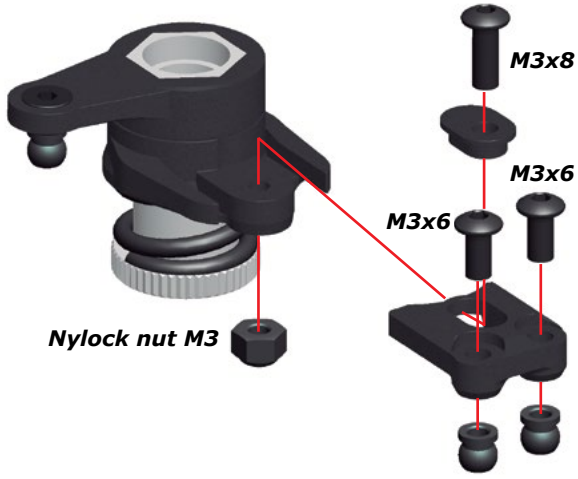
STEERING & FRONT ASSEMBLY

STEP 18

Bag 5

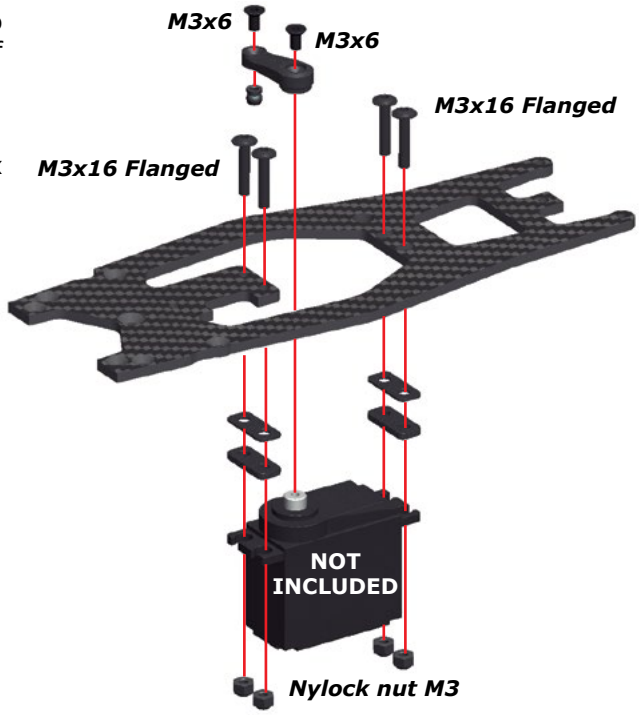
18.1

18.2

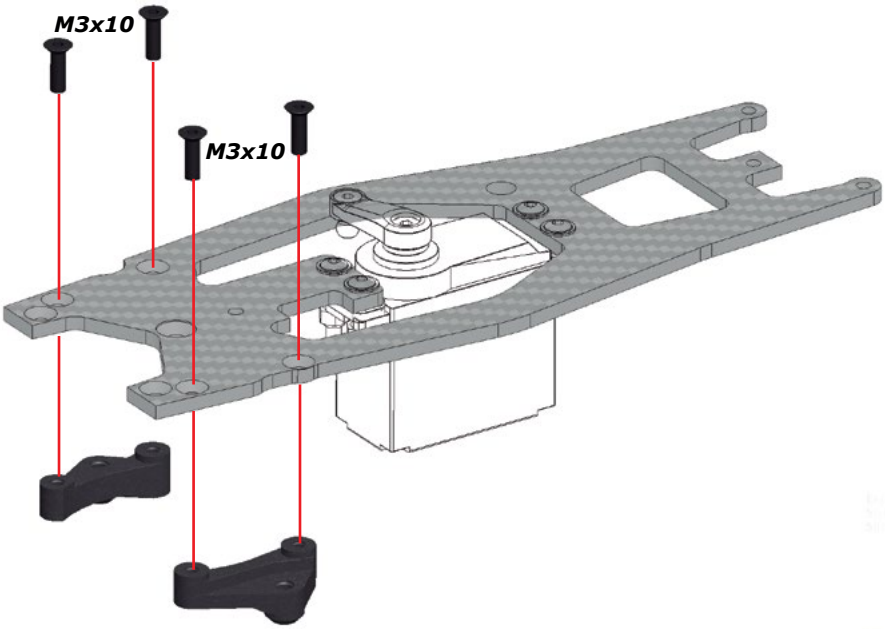


STEP 19

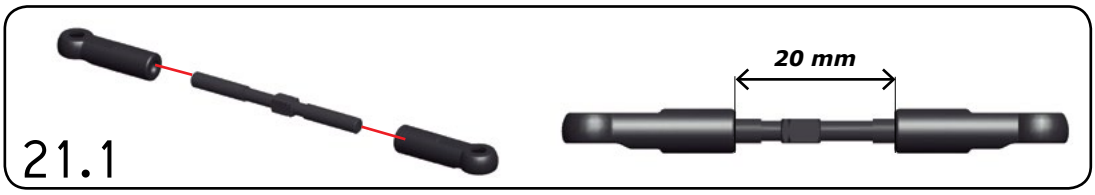
Use the following servo horns with this brand of servos:
23 - Sanwa / KO/ JR
24 - Hitec
25 - Futaba / Hitec/ Savox



STEP 20

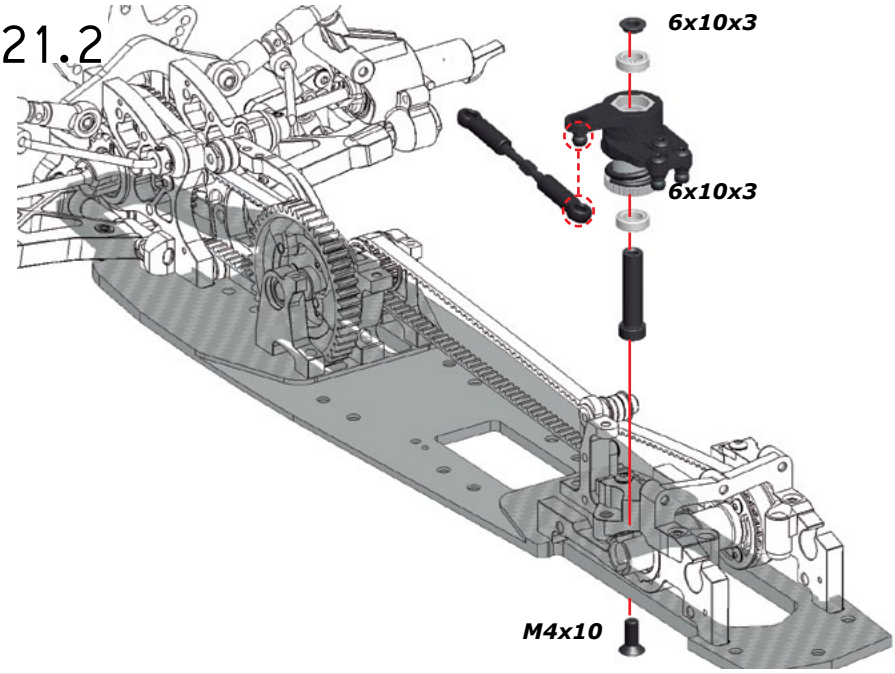


STEP 21

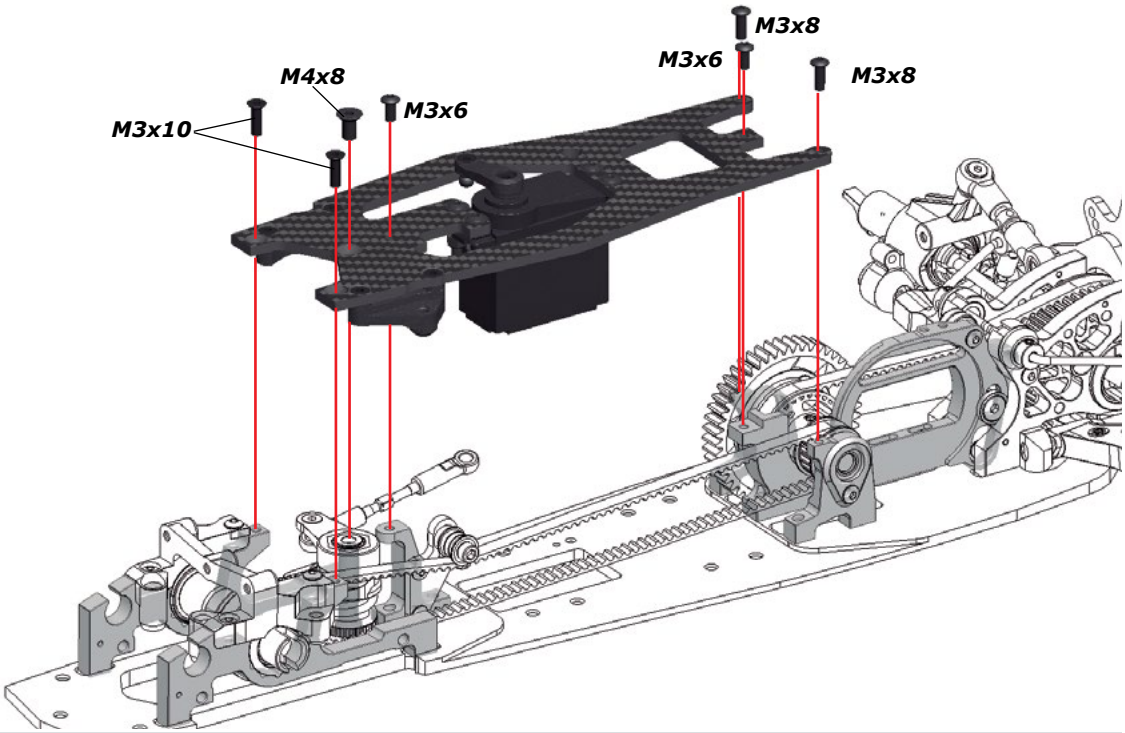


21.1

21.2



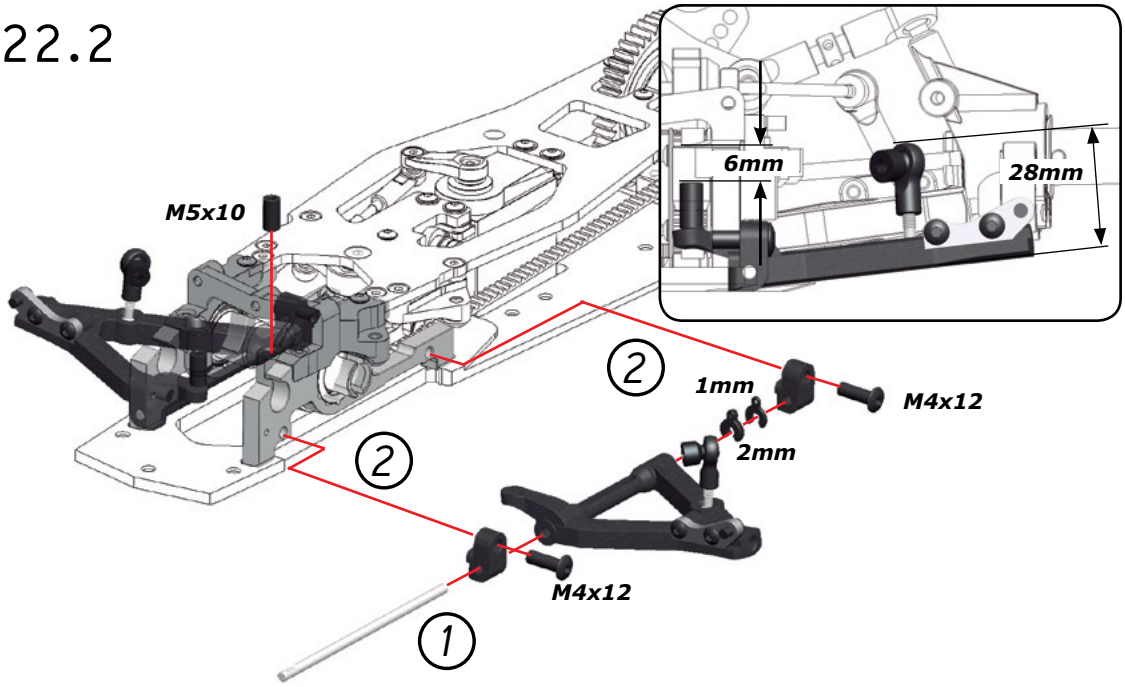
STEP 22



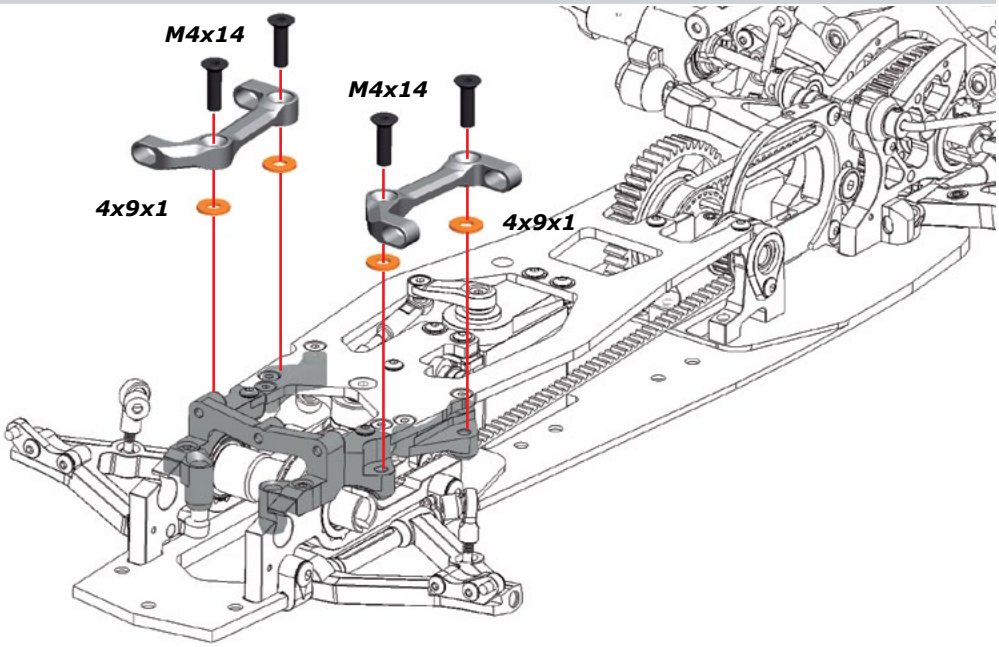
STEP 22

22.1

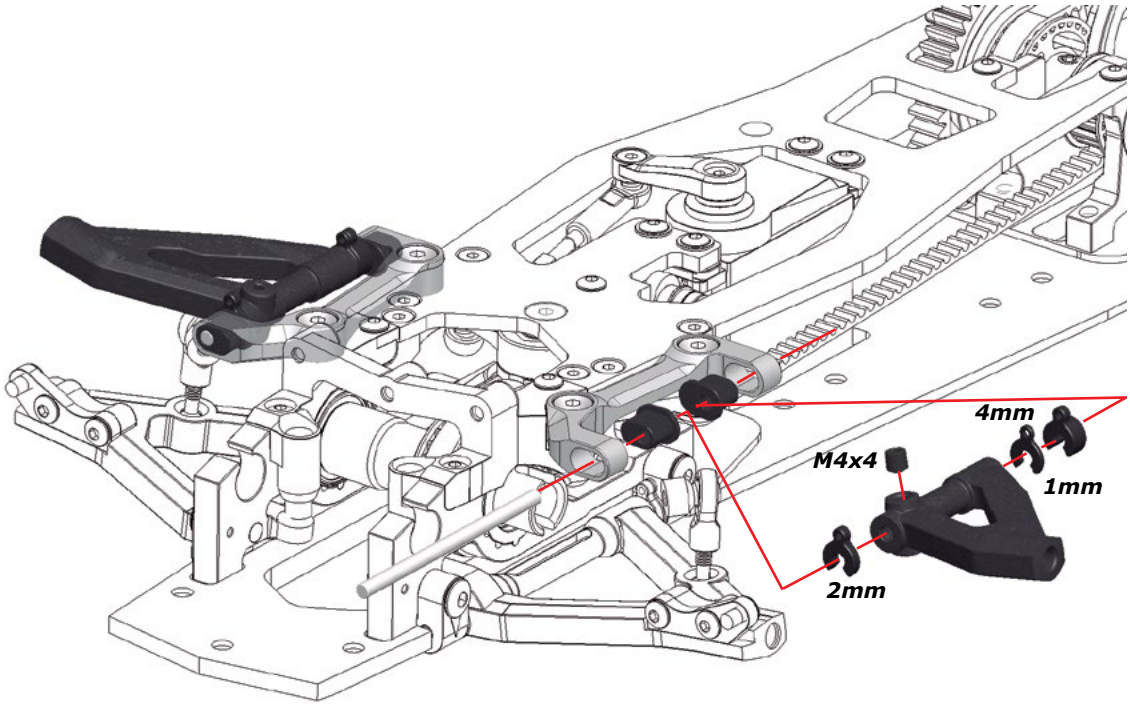
22.2



STEP 23

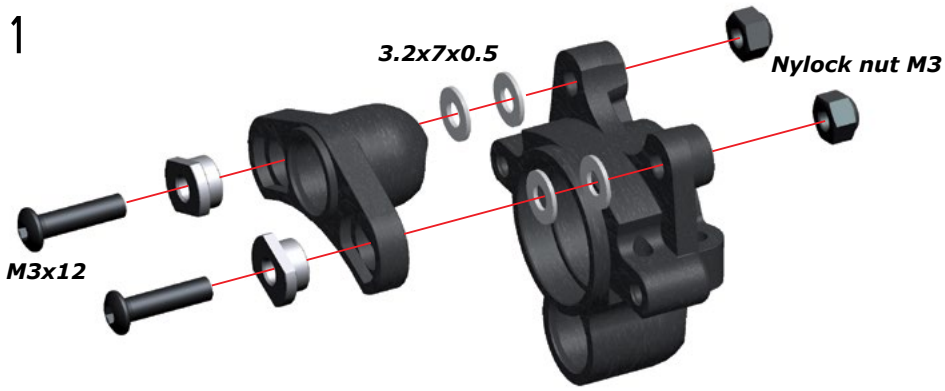


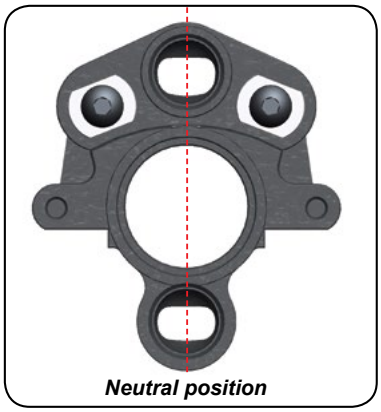
STEP 24

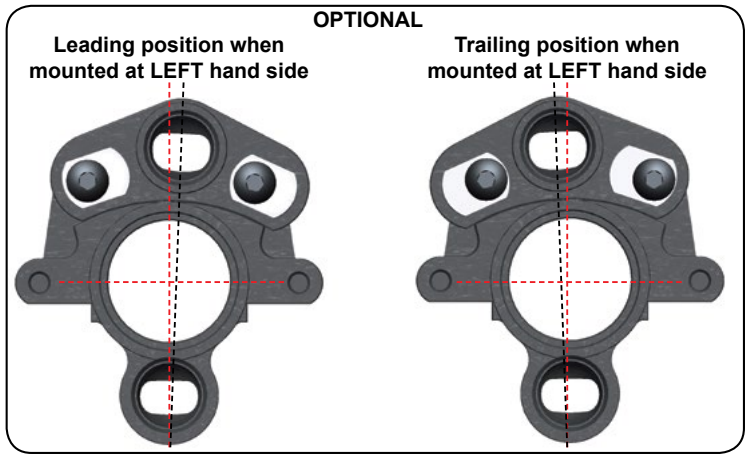


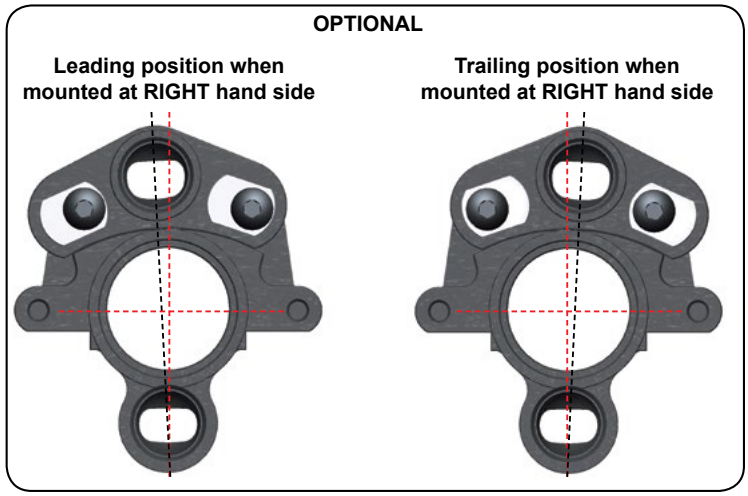
Bag 6

25.1

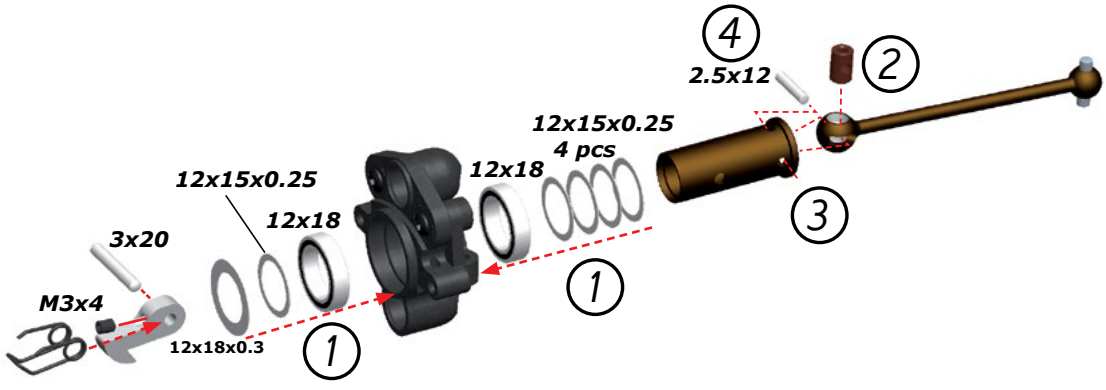

3.2x7x0.5
Nylock nut M3
M3x12


Neutral position

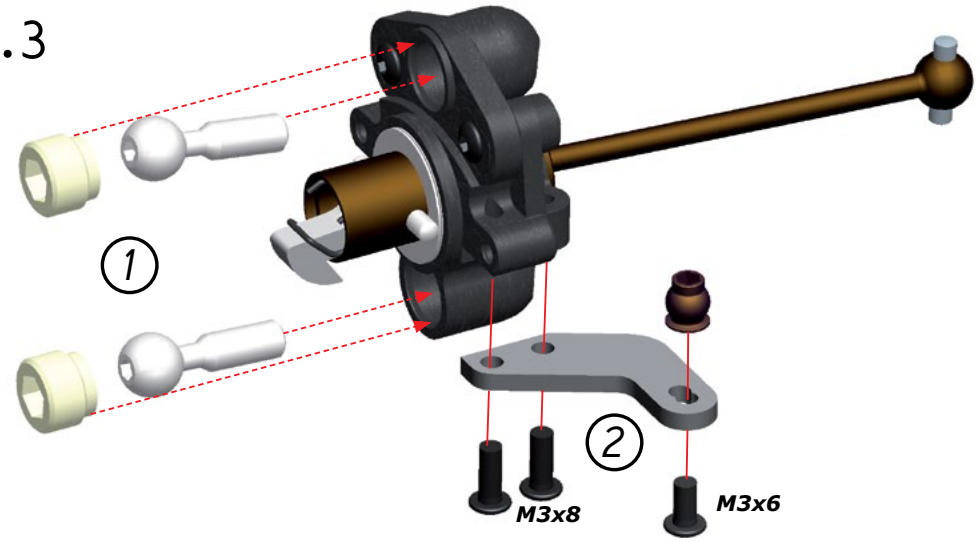

OPTIONAL
Leading position when mounted at LEFT hand side
Trailing position when mounted at LEFT hand side


OPTIONAL
Leading position when mounted at RIGHT hand side
Trailing position when mounted at RIGHT hand side

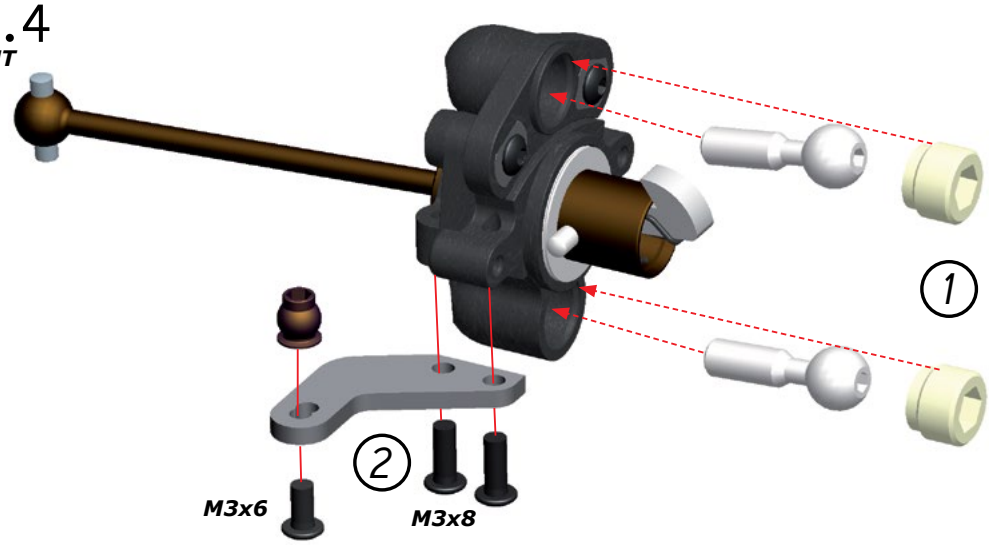
25.2


4
2.5x12
2
12x15x0.25
4 pcs
12x18
12x15x0.25
12x18
3x20
M3x4
12x18x0.3
3
1
1

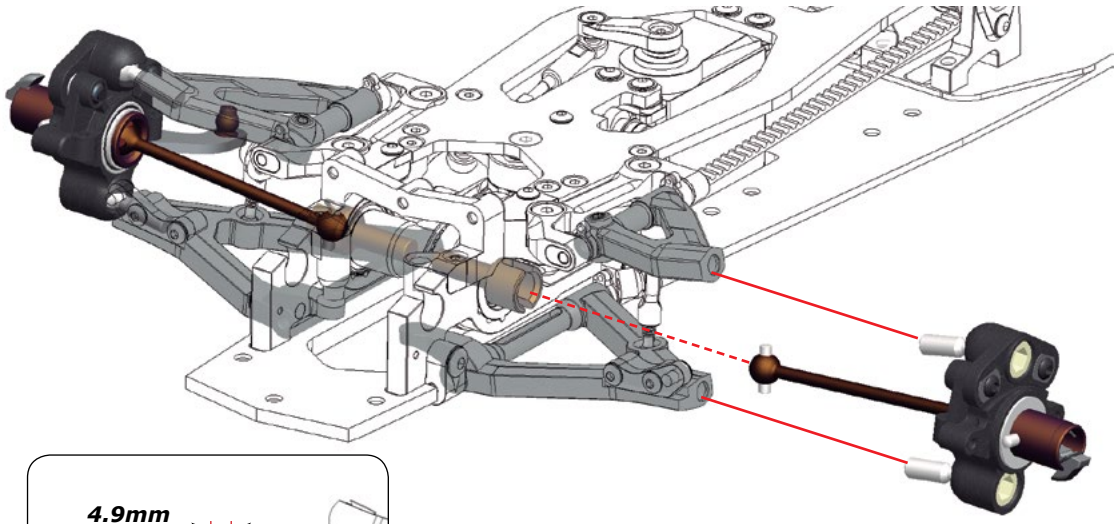
25.3
LEFT

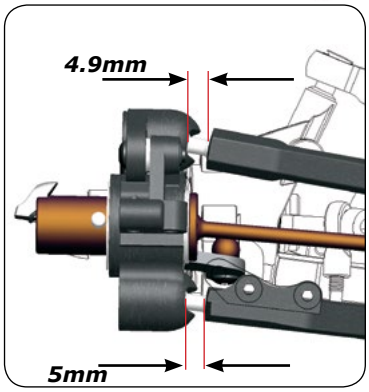


25.4
RIGHT



STEP
26

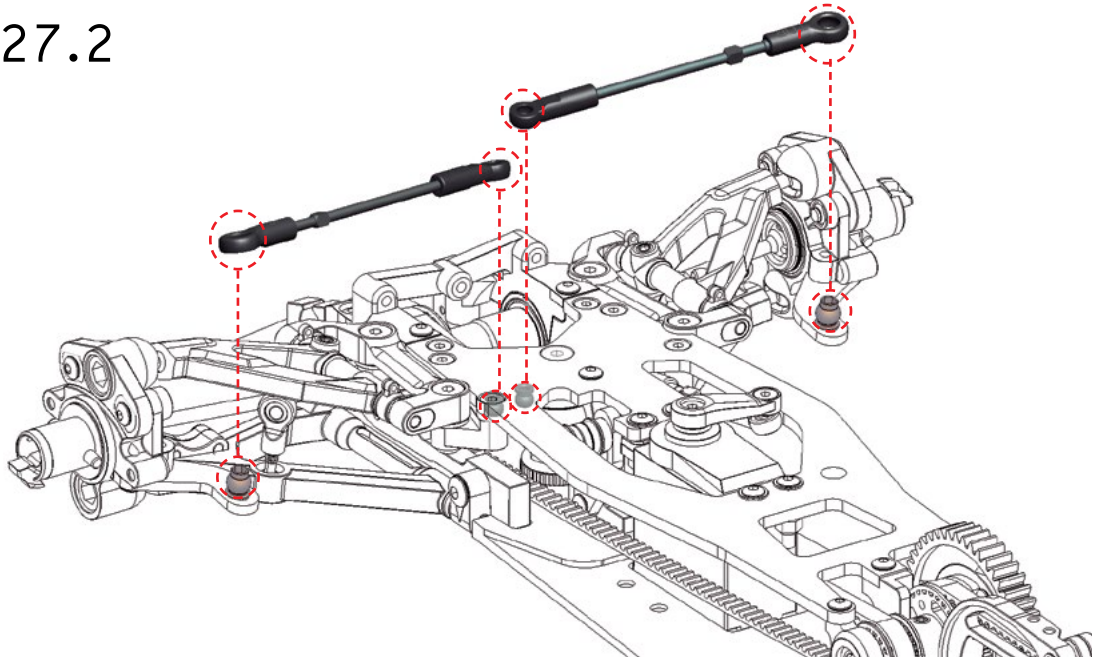




STEP 27

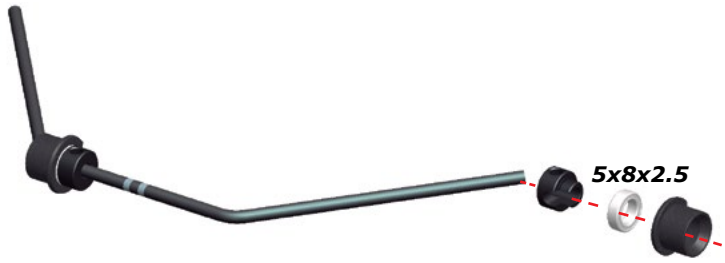
27.1

27.2

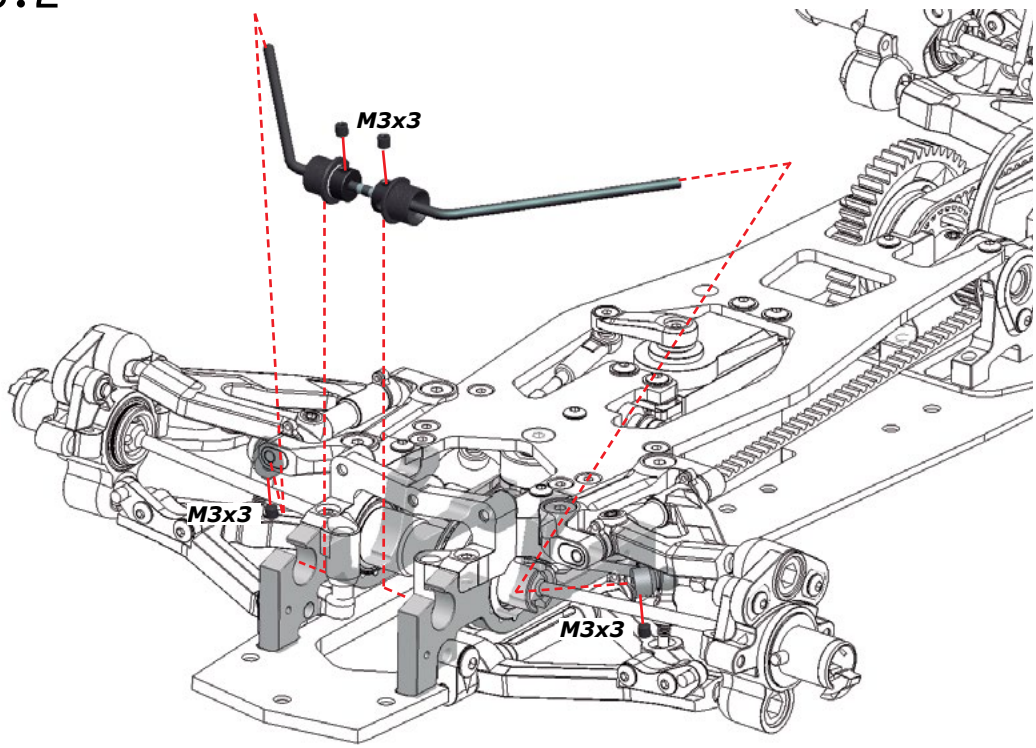


STEP 28

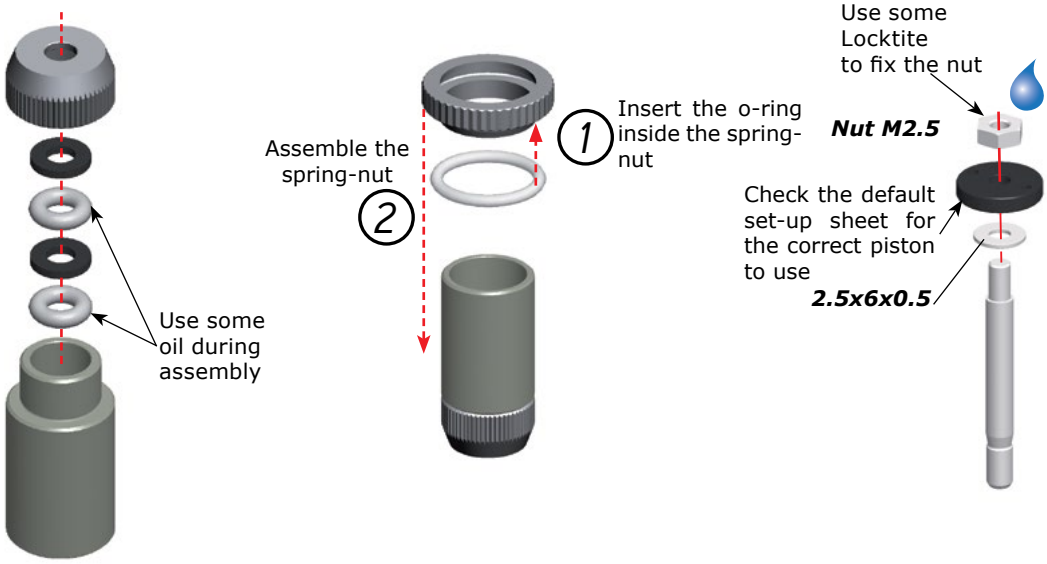
28.1



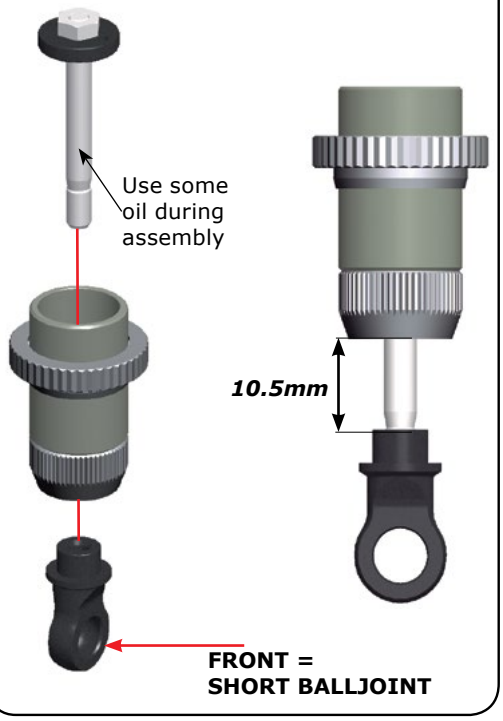
28.2



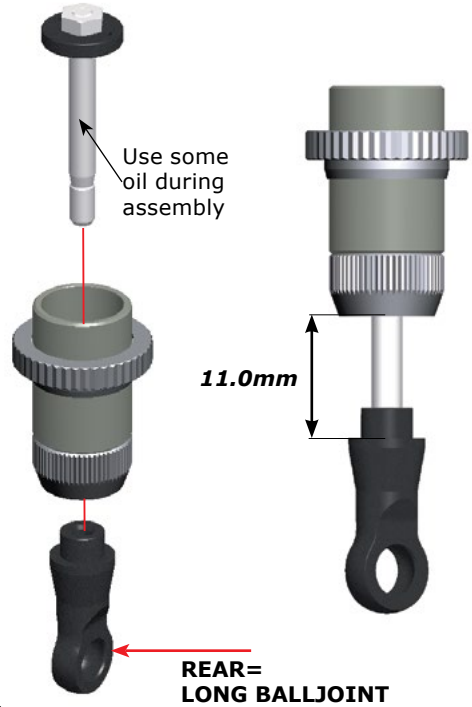
SHOCKS ASSEMBLY



FRONT SHOCKS

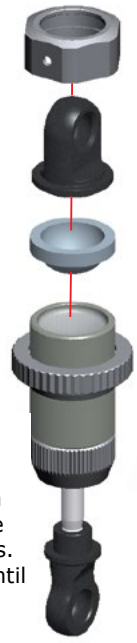


REAR SHOCKS



FILLING
Fill the shock body with the supplied shock absorber oil.

BLEEDING
Let the oil settle and allow the air to escape. Slowly move the piston up and down to release any trapped air bubbles. Repeat as necessary until no bubbles appear.

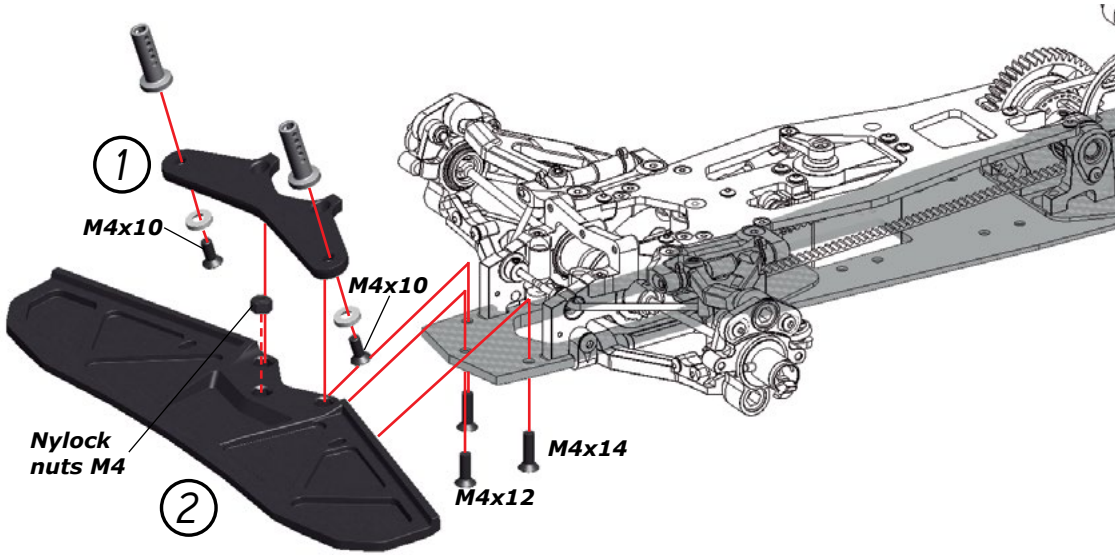


Assemble the spring and springcup to complete the shock
Check the default set-up sheet for spring details.

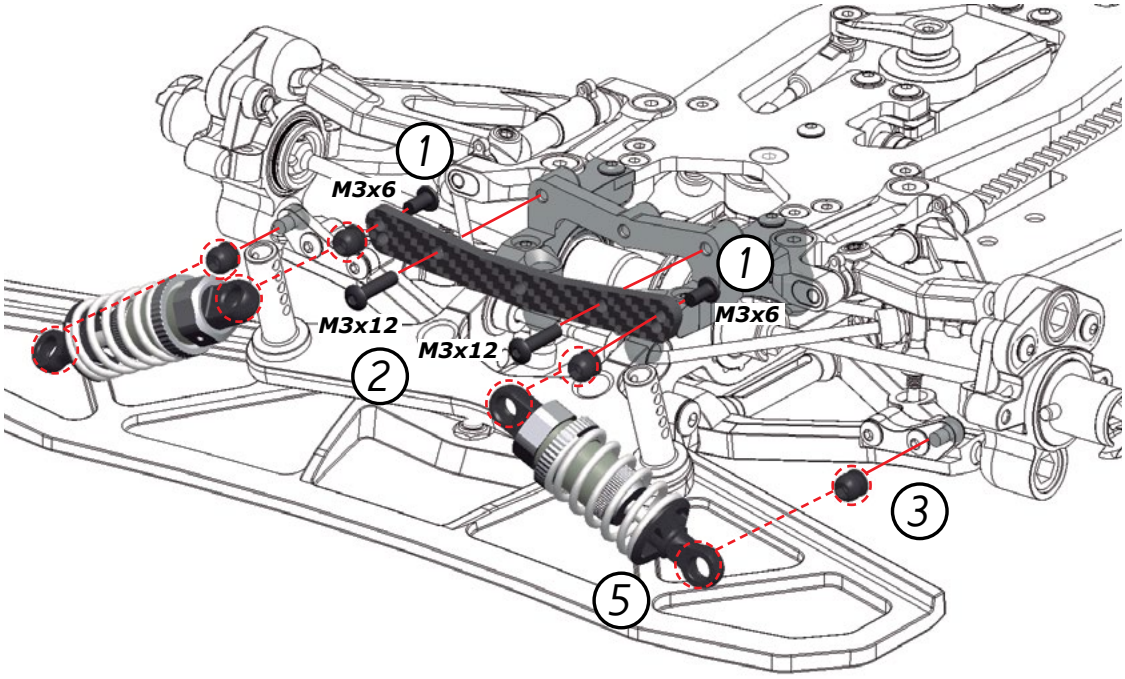
FINAL ASSEMBLY

STEP 30

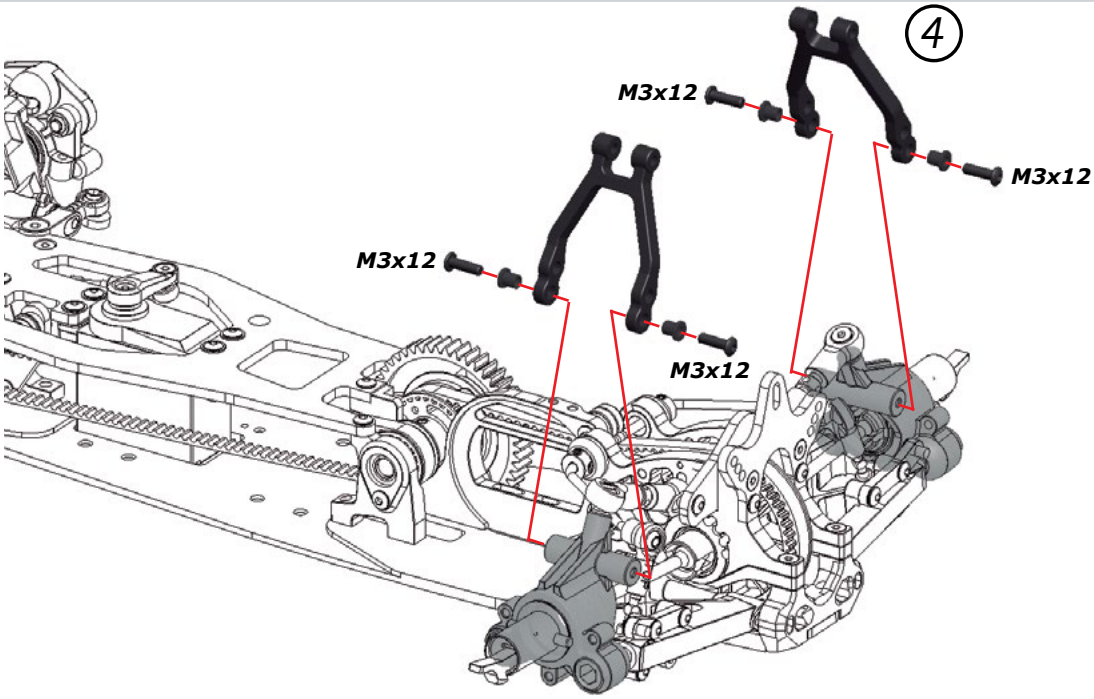
Bag 7



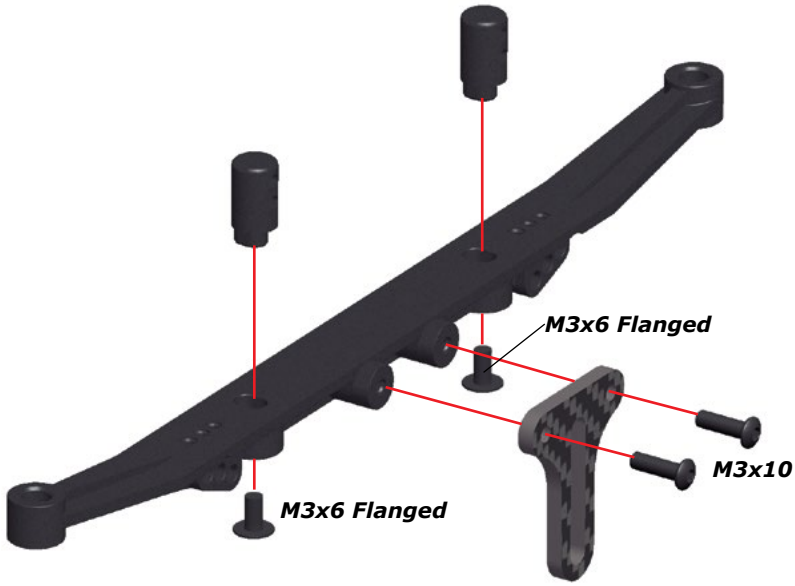
STEP 31



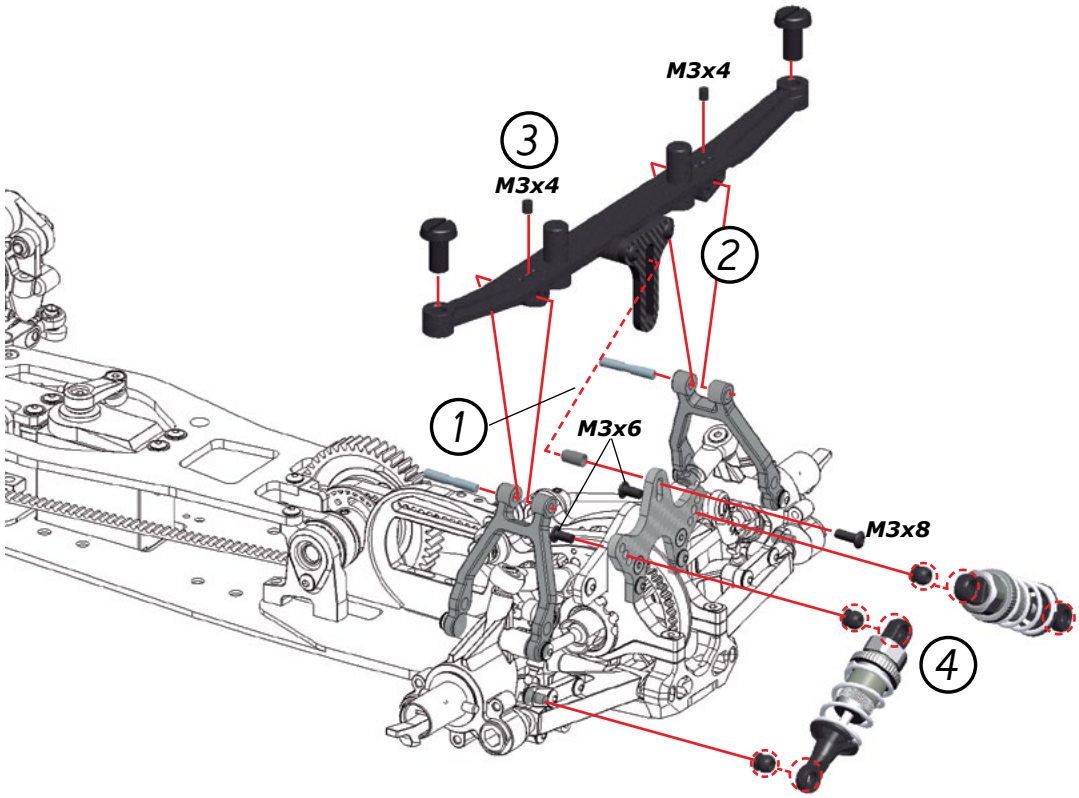
STEP 32



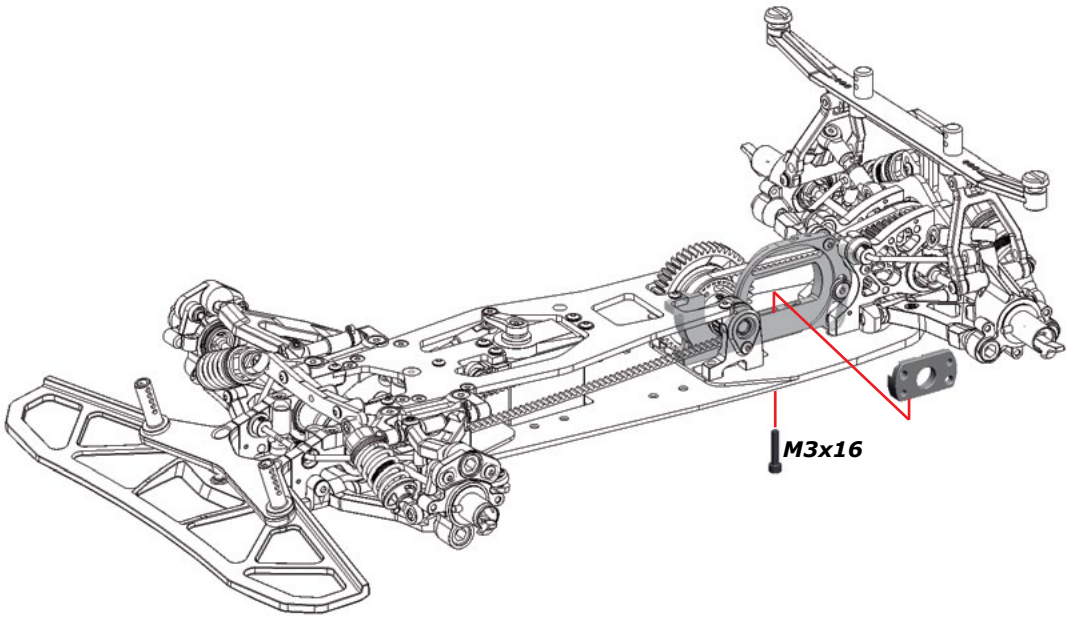
STEP 33



STEP 34

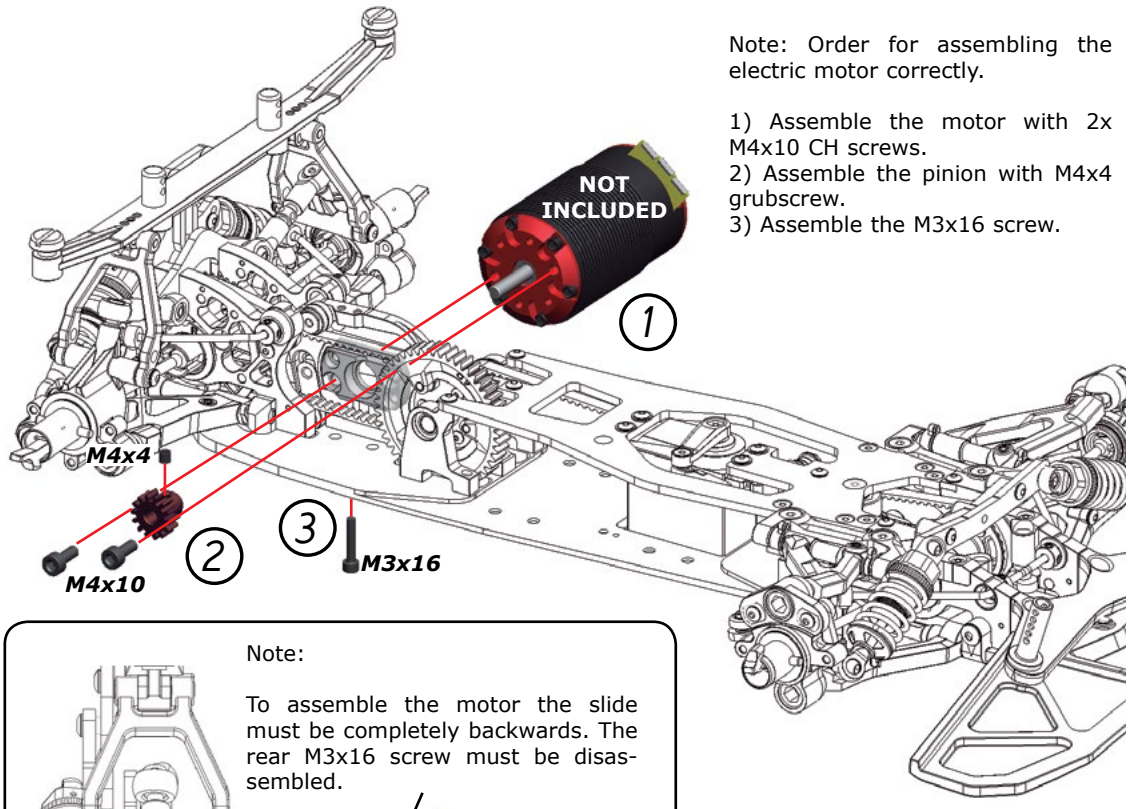


STEP 35



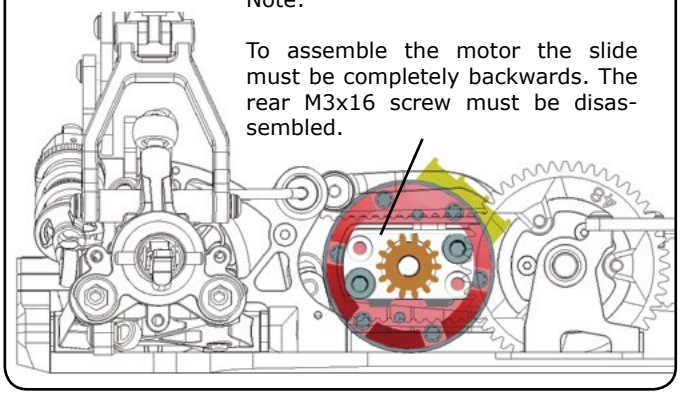
Bag 8

STEP
36



Note: Order for assembling the electric motor correctly.

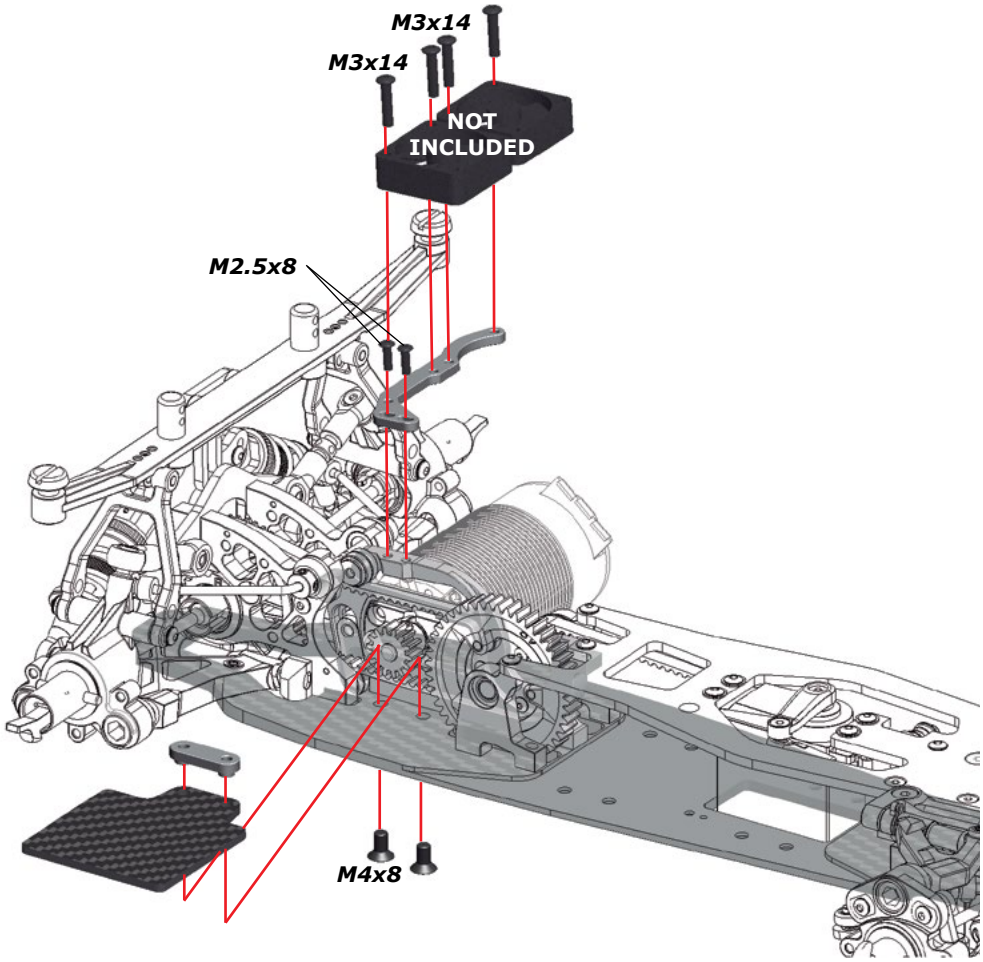
1) Assemble the motor with 2x M4x10 CH screws.
2) Assemble the pinion with M4x4 grubscrew.
3) Assemble the M3x16 screw.

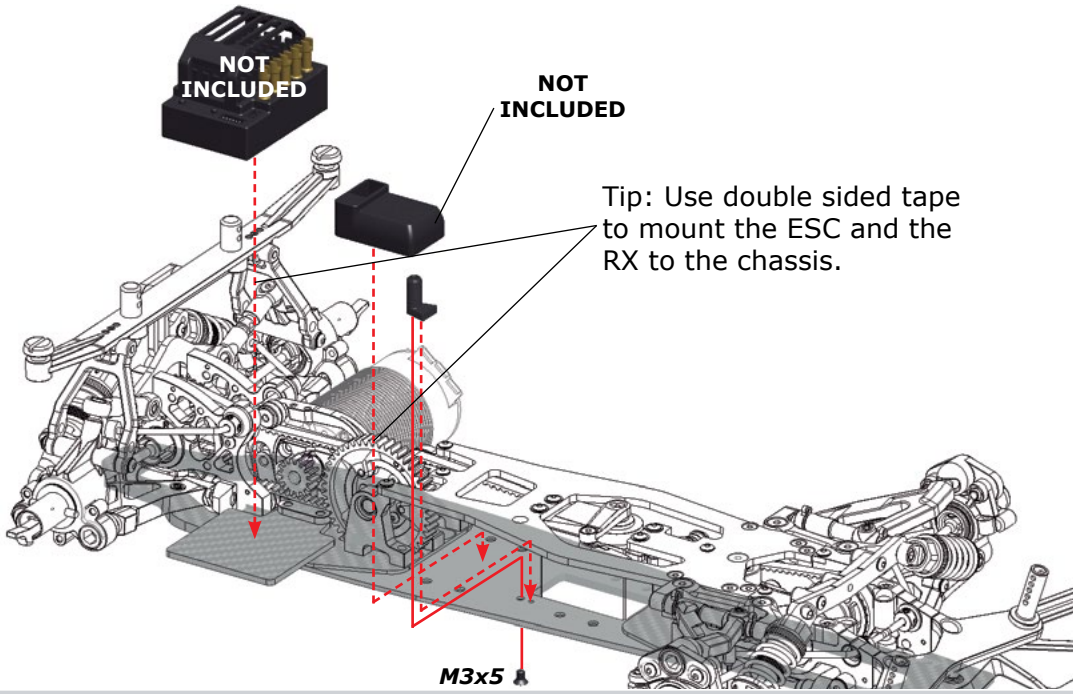


Note:

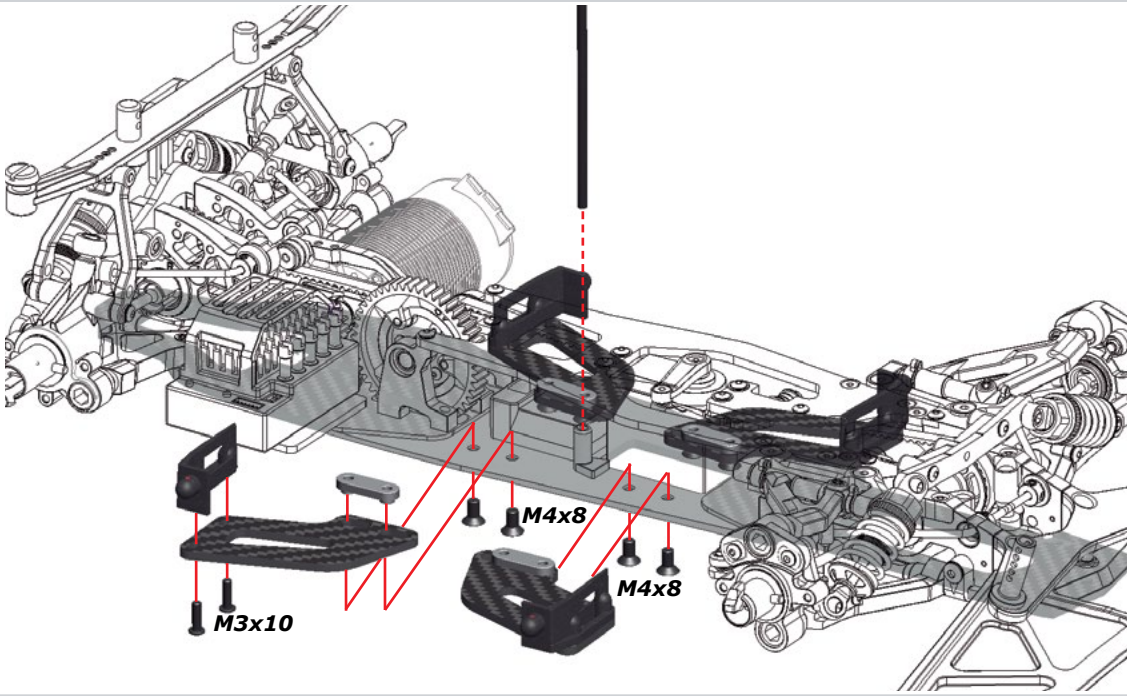
To assemble the motor the slide must be completely backwards. The rear M3x16 screw must be disassembled.

STEP
37

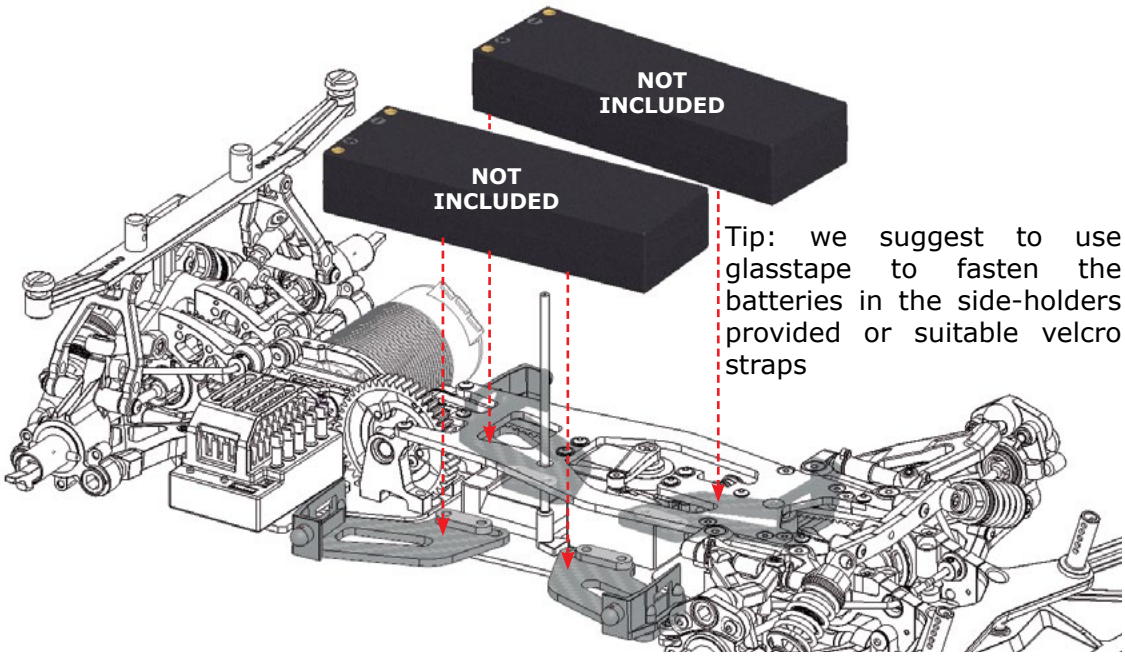


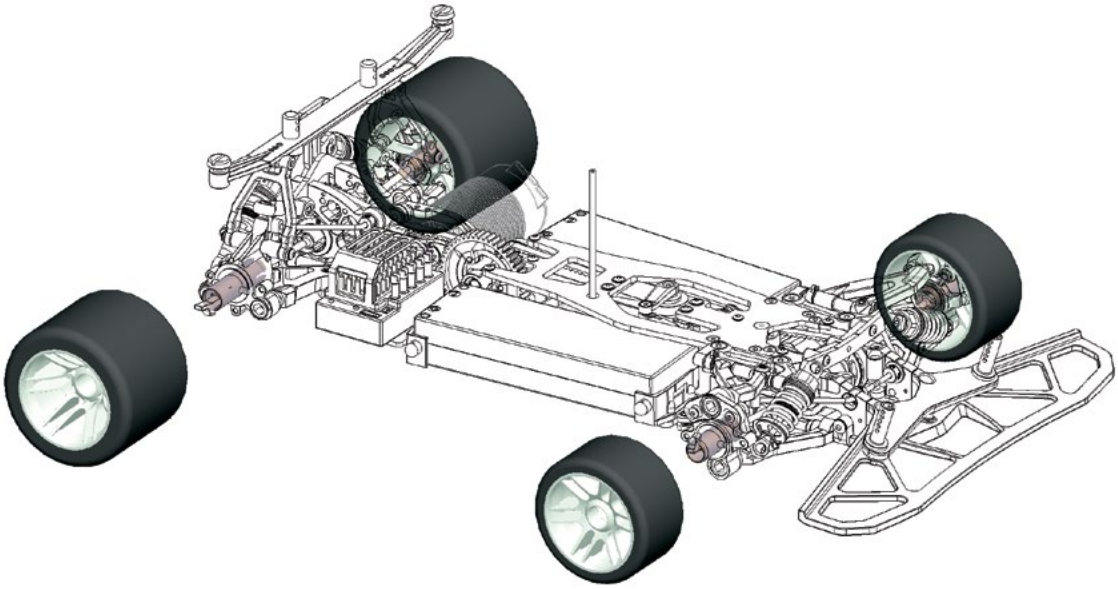


STEP 38



STEP 39





REF GUIDE:

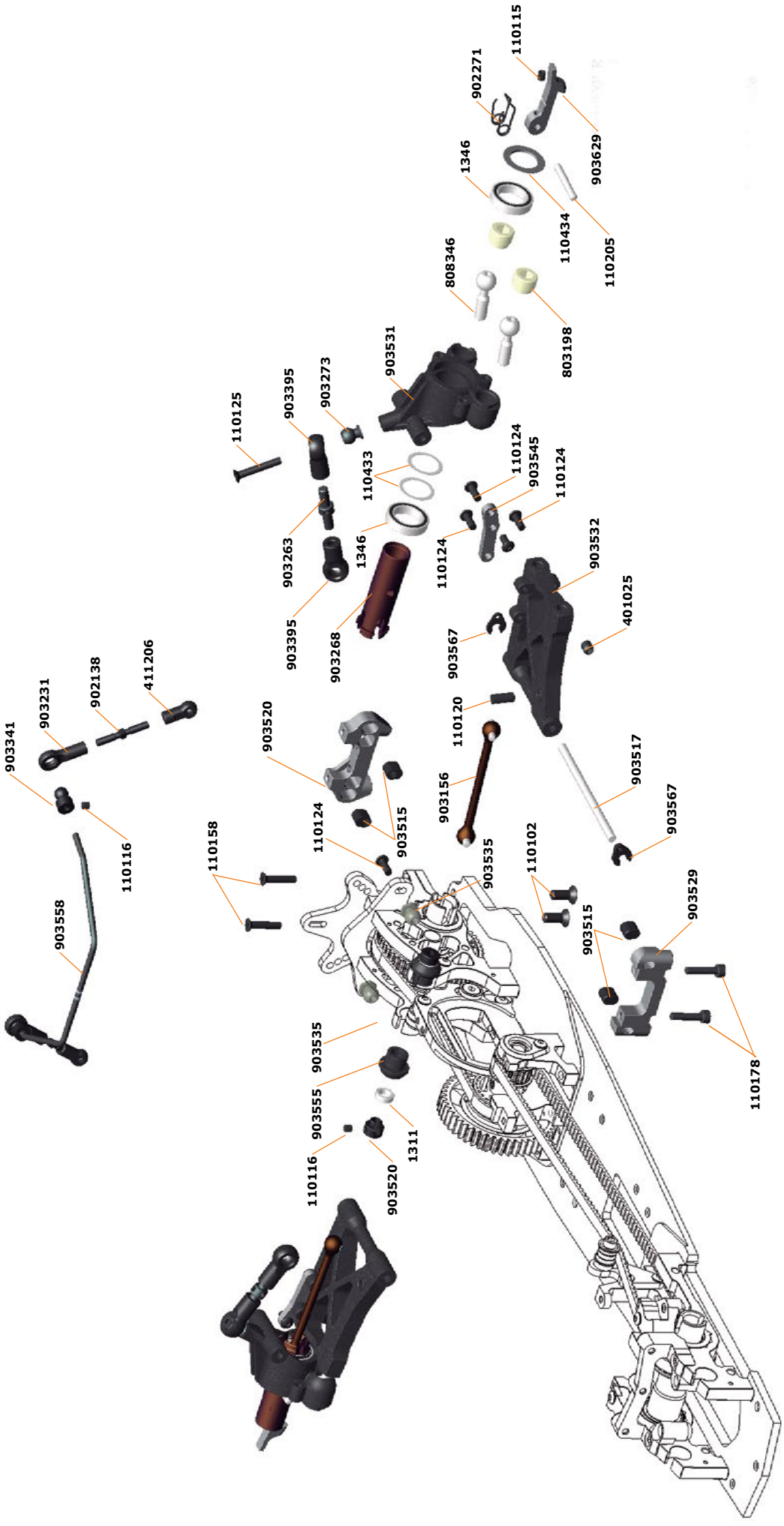
EXPLODED VIEWS and PARTS-LIST

Contents

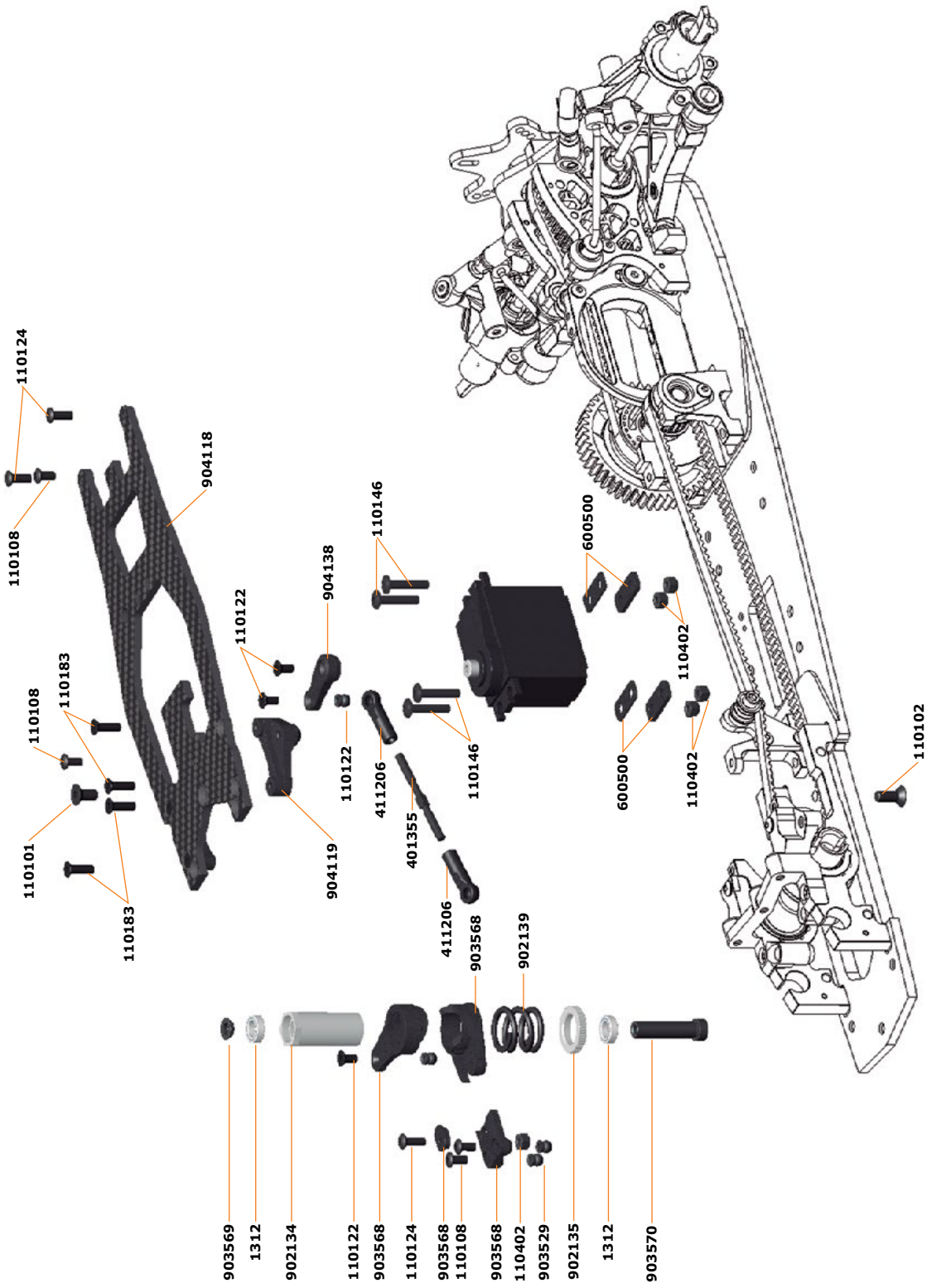
TRANSMISSION ASSEMBLY	**22**
REAR ASSEMBLY	**23**
STEERING ASSEMBLY	**24**
FRONT ASSEMBLY	**25**
SHOCKS ASSEMBLY	**26**
FINAL ASSEMBLY I	**27**
FINAL ASSEMBLY II	**28**
PARTS-LIST	**29**

TRANSMISSION ASSEMBLY

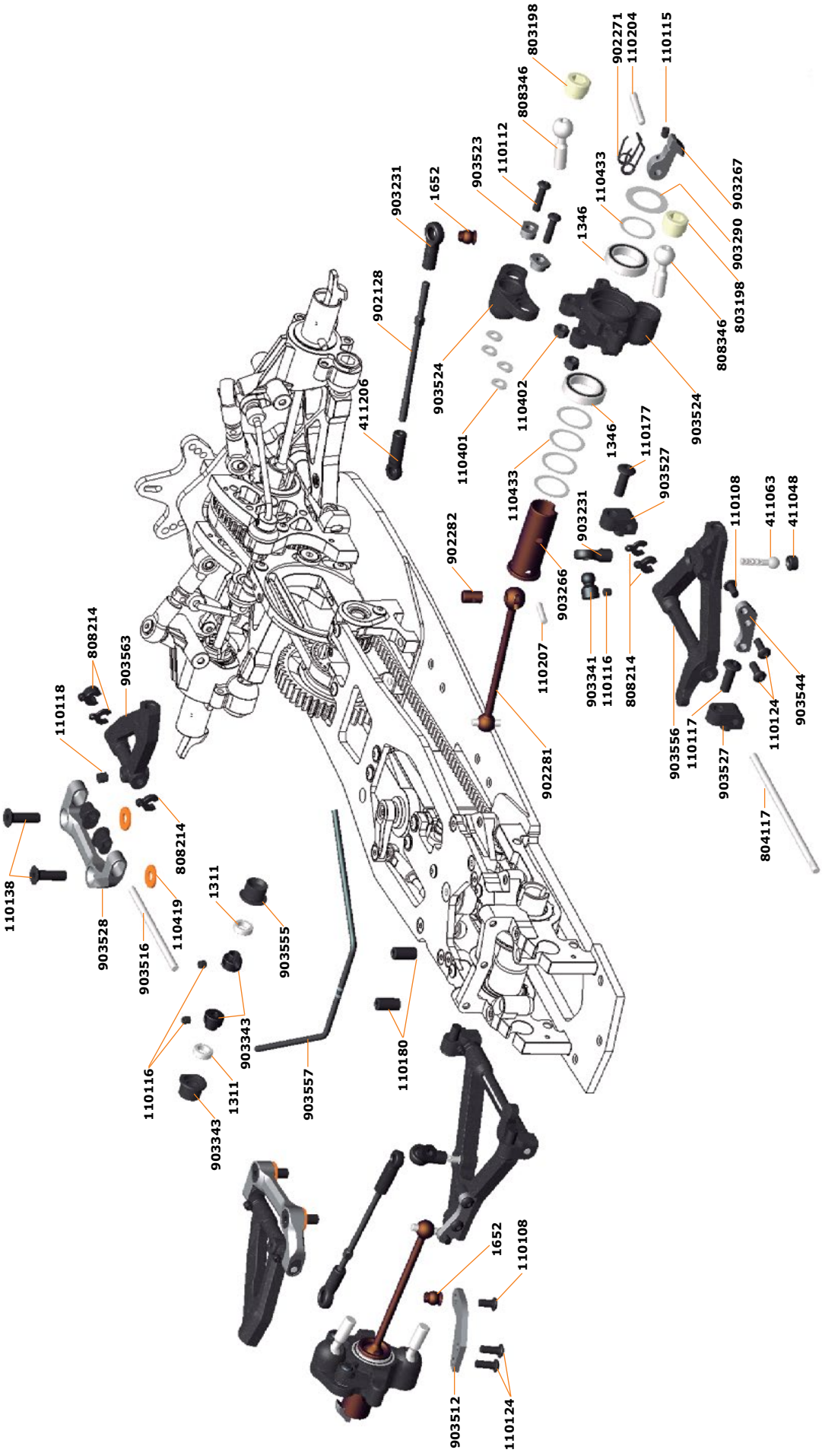
REAR ASSEMBLY



STEERING ASSEMBLY

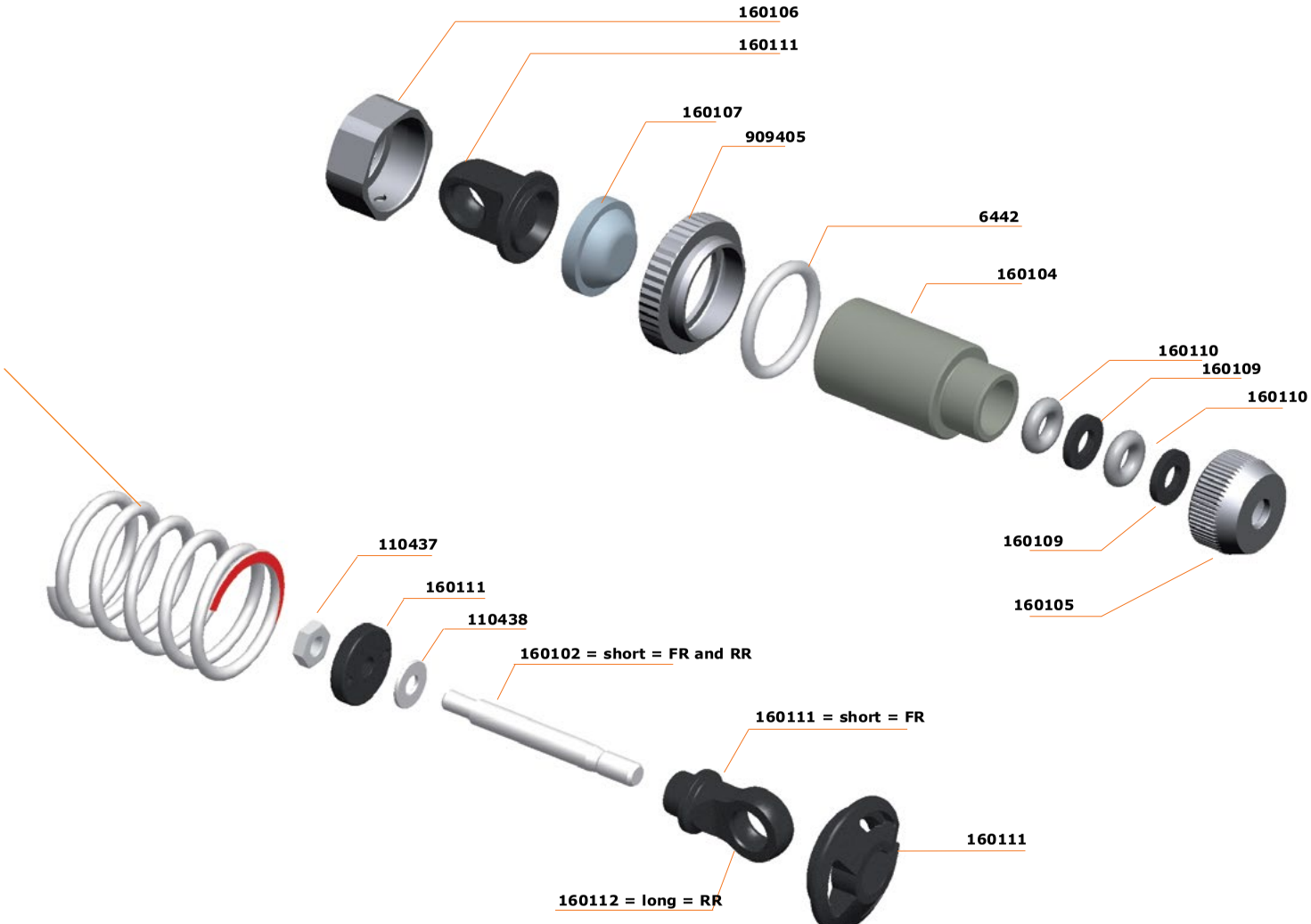


FRONT ASSEMBLY

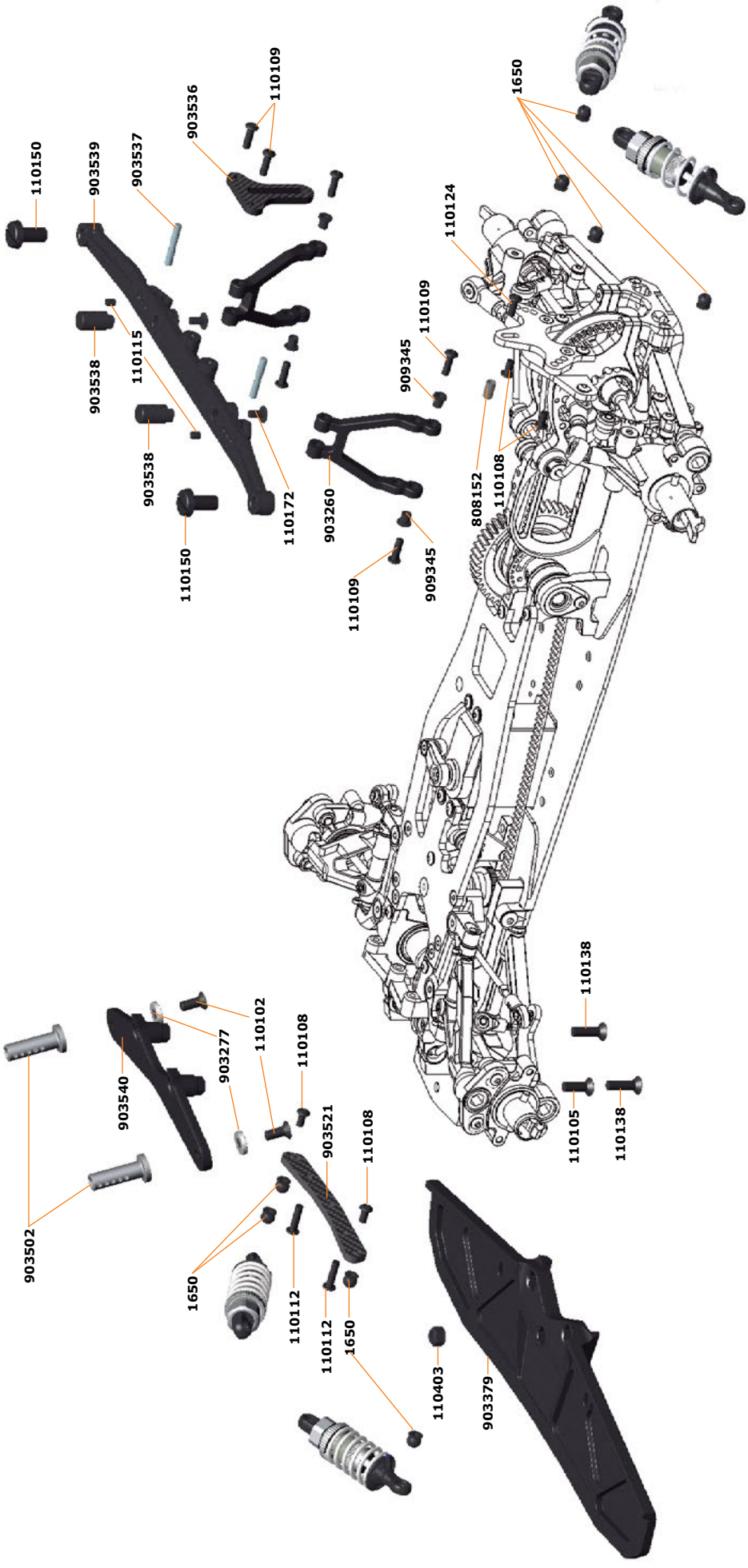


SHOCKS ASSEMBLY

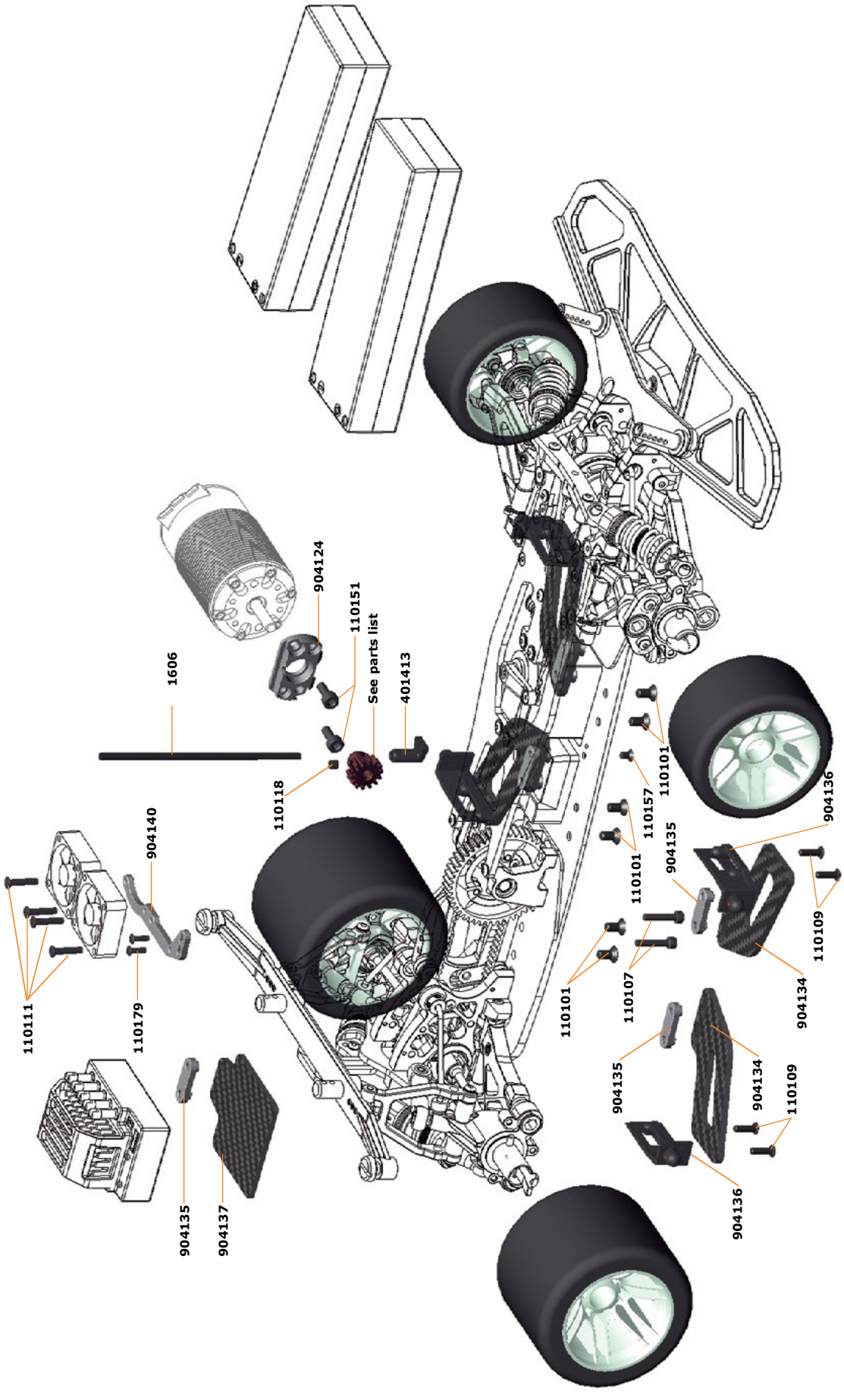
160300	Spring white L23 (2.3/13) (2)
160301	Spring yellow L23 (2.8/16) (2)
160302	Spring orange L23 (3.4/19.5) (2)
160303	Spring red L23 (4.1/23.5) (2)
160304	Spring pink L23 (4.0/28) (2)
160305	Spring blue L23 (5.8/33) (2)
160306	Spring purple L23 (6.8/39) (2)
160307	Spring green L23 (8/45.5) (2)
160308	Spring grey L23 (9/51.5) (2)
160309	Spring black L23 (10/57) (2)
160310	Spring-set short (5x2)
160320	Spring white L27 (2.3/13) (2)
160321	Spring yellow L27 (2.8/16) (2)
160322	Spring orange L27 (3.4/19.5) (2)
160323	Spring red L27 (4.1/23.5) (2)
160324	Spring pink L27 (4.0/28) (2)
160325	Spring blue L27 (5.8/33) (2)
160326	Spring purple L27 (6.8/39) (2)
160327	Spring green L27 (8/45.5) (2)
160328	Spring grey L27 (9/51.5) (2)
160329	Spring black L27 (10/57) (2)
160330	Spring black L27 set (5x2)



FINAL ASSEMBLY I



FINAL ASSEMBLY II



PARTS-LIST

904002 Serpent 977-E 1/8 4wd EP

ART No. DESCRIPTION

MANUAL / DECALS
1887 Decal Serpent black/white 1/8 (2)
903605 Decal sheet 977 black/white (2)

CHASSIS / RADIO PLATE
904118 Topdeck carbon 977E
904139 Chassis carbon 5mm 977E

RADIO INSTALLATION / BATTERY
1070 Grommet rubber soft (4)
1606 Antenna rod black (2)
411253 Pivotball uni 4.5mm (4)
600500 Servo spacers (8)
903231 Ball-joints frame 14+6+2
904118 Topdeck carbon 977E
904134 Battery mount carbon 977E (4)
904135 Battery mount slider 977E (4)
904136 Battery mount L+R 977E (2+2)
904137 ESC mounting plate carbon 977E
904138 Servo levers steering (3)

FRONT SECTION
1652 Steel balls 5.8mm long (4)
9212 Inner driveshaft adapter
401058 Rod threaded arb L/R 16mm (4)
401355 Trackrod M3x38mm (2)
411048 Adjust nut for front suspension
411063 Pivot ball threaded upper arm (2)
411206 Balljoint 4.5 (4)
411207 Balljoint 4.5 short (2)
411253 Pivotball uni 4.5mm (4)
803198 Adj nut pivotball 8.5mm nylon (10)
804117 Pivot pin FR lw (2)
808214 Spacer-set caster (3)
808346 Pivot-balls 8.5mm (2)
902128 Track-rod set (2)
902134 Servo-saver shaft outer
902135 Servo-saver pre-tension nut
902139 Servo saver spring hard
902271 Springs quick-change short (4)
902280 Wheel-axles cvd set FR
902281 Driveshaft-set cvd FR
902282 Insert steel cvd (2)
903231 Ball-joints frame 14+6+2
903266 Wheel-axles cvd OS2 FR (2)
903267 Lever alu/spring/pin OS2 FR (2)
903290 Shim alu wheelaxle OS2 18x12x1mm (4)
903341 Antirollbar ball 3mm (2)
903343 Antirollbar spacer 3mm (2)
903505 Pulley-set front (2)
903508 Suspension bracket FR up inserts (4+4)
903509 Excenter-set nylon FR/RR
903512 Steeringblock lever alu (2)
903516 Pivot pin FR up (2)
903521 Shocktower FR carbon
903523 Steeringblock excenters 0 + 1.5 (4+4)
903524 Steeringblock (2)
903527 Suspension bracket FR lw (4+4)
903528 Suspension bracket FR up alu (2)
903542 Bearing bracket FR up
903544 Shock extension bracket FR alu (2)
903555 Bearing bushing antiroll bar FR+RR (2+2)
903556 Wishbone FR lw L+R
903557 Antiroll bar FR medium
903562 Bearingblock FR (2)
903563 Wishbone FR up (2)
903568 Servo saver set
903569 Servosaver shaft bushing (2)
903570 Servo saver shaft inner
903574 Oneway front axle
904119 Topdeck bracket fr L+R 977E
904132 Belt front 50S3M468 low friction

Optionals
804253 Pivotball 5.8mm alu coated long (4)
903342 Antirollbar ball 2.5mm (2)
903344 Antirollbar spacer 2.5mm (2)
903378 Wheelaxle front OS2 alu (2)
903396 Pivot-balls 8.5mm titanium (8)
903579 Rim cover FR carbon (2)
903581 Steeringblock lever carbon (2)
903582 Shock extension bracket FR carbon (2)
903584 Antiroll bar FR soft
903585 Antiroll bar FR hard
903589 Servosaver bottom alu (2)
903594 Pulley front axle 28T alu
903601 Driveshaft cvd FR alu (2)
903611 Wishbone FR lw L+R hard
903612 Wishbone FR up (2) hard

MIDDLE SECTION
901255 Belt tensioner shaft and nut
903231 Ball-joints frame 14+6+2
903277 Washer alu conic M4 (4)
903505 Pulley-set front (2)
903535 Belt tensioner plate carbon
904120 Midshaft mount L 977E
904121 Midshaft mount R 977E
904122 Midshaft bearing plate carbon 977E (2)
904123 Motormount 977E
904124 Motor slider 977E
904128 Midshaft outer 977E
904129 Midshaft inner 977E
904130 Midshaft screw 977E (2)
904131 Belt rear 50S3M318 low friction
904132 Belt front 50S3M468 low friction
904133 Topdeck bracket middle 977E
904134 Battery mount carbon 977E (4)
904135 Battery mount slider 977E (4)
904136 Battery mount L+R 977E (2+2)
904137 ESC mounting plate carbon 977E
904140 Fan mount alu 977E

Optionals
903594 Pulley front axle 28T alu

REAR SECTION
1652 Steel balls 5.8mm long (4)
411206 Balljoint 4.5 (4)
411253 Pivotball uni 4.5mm (4)
803198 Adj nut pivotball 8.5mm nylon (10)
808346 Pivot-balls 8.5mm (2)
902138 Rod threaded L+R (2)
902271 Springs quick-change short (4)
903156 Driveshaft rear 62mm (2)
903231 Ball-joints frame 14+6+2
903263 Track-rod with hole 22mm (2)
903268 Wheel-axles OS2 RR (2)
903269 Lever alu/spring/pin OS2 RR (2)
903273 Ball 6.8mm steel (2)
903341 Antirollbar ball 3mm (2)
903343 Antirollbar spacer 3mm (2)
903395 Camberlink ball-end 6.8mm (4)
903503 Pulley-set rear (2)
903509 Excenter-set nylon FR/RR
903515 Pivot insert nylon RR (4+4)
903517 Pivot pin RR lw (2)
903520 Rearplate alu

903522 Shocktower RR carbon
903529 Suspension bracket RR-FR alu
903531 Upright (2)
903532 Wishbone RR lw (2)
903533 Bearingblock RR up (2)
903534 Bearingblock RR lw (2)
903541 Camberbracket RR carbon
903545 Shock extension bracket RR alu (2)
903547 Solid axle RR
903553 Pivotball threaded RR (2)
903555 Bearing bushing antiroll bar FR+RR (2+2)
903558 Antiroll bar RR medium
903567 Wheelbase spacer RR (2+2)
904125 Connector rr 977E (2)
904126 Belt tensioner mount rr 977E
904127 Belt tensioner shaft rr 977E (2)
904131 Belt rear 50S3M318 low friction

Optionals
903342 Antirollbar ball 2.5mm (2)
903344 Antirollbar spacer 2.5mm (2)
903391 Cvd axle set RR (2)
903392 Wheelaxle cvd RR (2)
903393 Driveshaft cvd RR (2)
903396 Pivot-balls 8.5mm titanium (8)
903398 Wheelaxle cvd RR alu (2)
903578 Rim cover RR carbon (2)
903583 Shock extension bracket RR carbon (2)
903586 Antiroll bar RR soft
903587 Antiroll bar RR hard
903595 Pulley rear axle 48T alu
903599 Solid axle RR light
903609 Upright (2) hard
903610 Wishbone RR lw (2) hard

Pinions
600452 Pinion 12T
600453 Pinion 13T
600454 Pinion 14T
600455 Pinion 15T
600456 Pinion 16T
600457 Pinion 17T
600458 Pinion 18T
600459 Pinion 19T
600460 Pinion 20T

Spurgear
903371 2-speed gear 48T SL8
903372 2-speed gear 49T SL8
903373 2-speed gear 50T SL8

SHOCK ABSORBERS
6442 O-ring adj.nut (10)
160100 Shockset RCM on-road short (2)
160102 Shock RCM shaft short (2)
160104 Shock RCM body alu (2)
160105 Shock RCM bottom (2)
160106 Shock RCM top nut (2)
160107 Shock RCM membrame (4)
160108 Shock RCM bushings (8)
160110 Shock RCM bottom O-ring (8)
160111 Shock RCM parts frame nylon short (14)
160112 Shock RCM parts frame nylon long (14)
160121 Shock top RCM shock (2)
160122 Shock balljoint short on-road (2)
160123 Shock balljoint long on-road (2)
160134 Shock pistons set RCM (2x4)
909405 Shock adj nut alu +o-ring (4)

Optionals
160109 Shock RCM bushing machined (8)
160115 Shock RCM shaft short TiN coated (2)
160117 Shock piston RCM machined 1-hole (4)
160118 Shock piston RCM machined 2-hole (4)
160119 Shock piston RCM machined 3-hole (4)
160120 Shock piston RCM machined 4-hole (4)

SHOCK SPRINGS
160303 Spring red L23 (4.1/23.5) (2)
160304 Spring pink L23 (4.0/28) (2)
160305 Spring blue L23 (5.8/33) (2)
160306 Spring purple L23 (6.8/39) (2)
160307 Spring green L23 (8/45.5) (2)
160308 Spring grey L23 (9/51.5) (2)
160309 Spring black L23 (10/57) (2)
160310 Spring-set short (5x2)
160323 Spring red L27 (4.1/23.5) (2)
160324 Spring pink L27 (4.0/28) (2)
160325 Spring blue L27 (5.8/33) (2)
160326 Spring purple L27 (6.8/39) (2)
160327 Spring green L27 (8/45.5) (2)
160328 Spring grey L27 (9/51.5) (2)
160329 Spring black L27 (10/57) (2)
160330 Spring-set long (5x2)

BODYMOUNTS FR and RR
1601 Body clips (10)
1729 Screw-nut M6 black nylon (2)
808152 Centering bushing threaded
903277 Washer alu conic M4 (4)
903379 Bumper 966 aero
903502 Body post alu eccentric short (2)
903536 T bracket bodymount RR carbon
903537 Bodymount pivot pin (2)
903538 Bodysupport long + short RR (2+2)
903539 Bodymount RR
903540 Bodymount FR

BALL-BEARINGS
401131 Ballbearing 5x10x3 (2)
1311 Ballbearing 5x8x2.5 (2)
1312 Ballbearing 5x8x2.5 flanged (2)
1314 Ballbearing 6x12x4 (2)
1321 Ballbearing 6x10x3 (2)
1346 Ball-bearing 12x18x4 (2)

FASTNERS
110101 Screw allen countersunk m4x8 (10)
110102 Screw allen countersunk m4x10 (10)
110103 Screw allen countersunk m4x16 (10)
110104 Screw allen countersunk m3x8 (10)
110105 Screw allen countersunk m4x12 (10)
110106 Screw allen flanged roundhead m5x12 (10)
110107 Screw allen cilinderhead m3x16 (10)
110108 Screw allen roundhead m3x6 (10)
110109 Screw allen roundhead m3x10 (10)
110110 Screw allen roundhead m3x16 (10)
110111 Screw allen roundhead m3x14 (10)
110112 Screw allen roundhead m3x12 (10)
110113 Screw allen roundhead m4x8 (10)
110114 Setscrew allen m3x8 (10)
110115 Setscrew allen m3x4 (10)
110116 Setscrew allen m3x3 (10)
110117 Setscrew allen m3x12 (10)
110118 Setscrew allen m4x4 (10)
110119 Setscrew allen m4x6 (10)
110120 Setscrew allen m4x10 (10)
110121 Setscrew allen m5x6 (10)
110122 Screw allen countersunk m3x6 (10)
110123 Screw philips roundhead 3.5x13 (10)
110124 Screw allen roundhead m3x8 (10)
110125 Screw allen countersunk m3x20 (10)

110126 Screw allen countersunk m2.5x12 (10)
110127 Screw allen countersunk m3x12 (10)
110128 Screw allen roundhead m3x5 (10)
110129 Screw allen cilinderhead m3x10 (10)
110130 Screw allen roundhead m2.5x6 (10)
110131 Screw allen roundhead m2.5x10 (10)
110132 Screw allen countersunk m3x16 (10)
110133 Screw philipshead countersunk 2.5x8 wide (10)
110134 Screw philipshead countersunk 2.5x10 wide (10)
110135 Screw allen countersunk M2.5x10 (10)
110136 Screw allen countersunk M2.5x8 (10)
110137 Setscrew allen M3x6 (10)
110138 Screw allen countersunk M4x14 (10)
110139 Screw allen countersunk M3x40 (10)
110140 Screw allen roundhead M3x20 (10)
110141 Screw allen roundhead M3x22 (10)
110142 Screw allen roundhead M3x25 (10)
110143 Screw allen roundhead M4x18 (10)
110144 Screw allen roundhead M3x18 (10)
110145 Screw allen roundhead flanged M3x12 (10)
110146 Screw allen roundhead flanged M3x16 (10)
110147 Screw ph roundhead M2.5x5 (10)
110148 Setscrew allen M5x4 (10)
110149 Screw allen countersink M2x10 (10)
110150 Screw M6x12 nylon black (2)
110151 Screw allen cilinderhead M4x10 (10)
110152 Screw allen cilinderhead M3x8 (10)
110153 Screw allen roundhead M2.3x4(10)
110154 Setscrew allen M3x10 (10)
110155 Setscrew allen M3x5 (10)
110156 Screw allen countersunk M2.2x6 (10)
110157 Screw allen countersunk M3x5 (10)
110158 Screw allen countersunk M3x15 (10)
110159 Screw allen countersunk M3x18 (10)
110160 Screw allen cilinderhead M2.2x12 (10)
110161 Screw allen cilinderhead M2x6 (10)
110162 Setscrew allen M3x2.5 (10)
110163 Setscrew allen M3x2 (10)
110164 Screw allen roundhead M3x4 (10)
110165 Screw allen cilinderhead M2x5 (10)
110166 Screw allen countersunk M2.5x5 (10)
110167 Screw allen roundhead flanged M3x18 (10)
110168 Screw allen roundhead flanged M3.5x10 (10)
110169 Screw allen roundhead flanged M4x10 (10)
110170 Screw allen roundhead flanged M3x28 (10)
110171 Screw ph roundhead widethread 2.5x6 (10)
110172 Screw allen roundhead flanged M3X6 (10)
110173 Screw ph countersunk widethread 2.5x12 (10)
110174 Screw allen countersunk M4x6 (10)
110175 Screw allen cilinderhead M3x40 (10)
110176 Screw allen cilinderhead M3x18 (10)
110177 Screw allen roundhead M4x12 (10)
110178 Screw allen cilinderhead M3x14 (10)
110179 Screw allen roundhead M2.5x8 (10)
110180 Setscrew allen M5x10 (10)
110181 Screw M5x10 + Nut nylon black (4+4)
110182 Screw allen roundhead M2x4 (10)
110183 Screw allen countersunk M3x10 (10)
110184 Screw allen countersunk M3x14 (10)
110185 Screw allen cilinderhead M3x30 (10)
110186 Screw allen cilinderhead M3x35 (10)
110187 Setscrew allen M3x16 (10)
110188 Screw allen cilinderhead M2x10 (10)
110189 Setscrew allen M4x8 (10)
110200 Pin 2.5x8 (10)
110201 Pin 3x12 (10)
110202 Pin 5x5 (10)
110203 Pin 3x14 (10)
110204 Pin 3x20 (10)
110205 Pin 3x22 (10)
110206 Pin 2.5x22 (10)
110207 Pin 2.5x12 (10)
110208 Pin nra 2x9.8 (4)
110209 Pin nra 2x18 (4)
110210 Pin 3x13 (10)
110211 Pin 2.5x13 (10)
110212 Pin 2.5x17 (10)
110213 Pin 2.5x10 (10)
110214 Pin 3x15 (10)
110215 Pin 2x12 (10)
110216 Pin 2.5x15 (10)
110217 Pin 2x9 (10)
110218 Pin 3x10 (10)
110219 Pin 2x14 (10)
110220 Pin 1.5x8 (10)
110221 Pin 1.7x7.6 (10)
110222 Pin 1.7x8.5 (10)
110300 E-clip 2.3 (10)
110301 E-clip 3.2 (10)
110302 E-clip 4.0 (10)
110303 E-clip 5.0 (10)
110304 E-clip 7.0 (10)
110305 Seger clip 12x1.0 (10)
110306 E-clip 6.0 (10)
110307 E-clip 9.0 (10)
110400 Shim 6.0x10x0.2(10)
110401 Shim3.2x7x0.5 (10)
110402 Nut nylock M3 (10)
110403 Nut nylock M4 (10)
110404 Shim 6x8x0.3 (10)
110405 Nut nylock M4 flanged (10)
110406 Nut nylock M2.2 (10)
110407 Nut M3 (10)
110408 Shim 3X5X0.3 (10)
110409 Shim 3X5X1 (10)
110410 Shim 3X5X2 (10)
110411 Shim 3X5X4 (10)
110412 Shim 3.5X8X1 (10)
110413 Shim 3.5X12X0.2 (10)
110414 Shim 3X6X0.1 (10)
110415 Shim 3X6X0.5 (10)
110416 Shim 3X6X0.8 (10)
110417 Shim 3X6X3 (10)
110418 Shim 4X8X0.1 (10)
110419 Shim 4X9.5X1 (10)
110420 Shim 4X9.5X2(10)
110421 Shim 4X9.5X4(10)
110422 Shim 4X10X0.3 (10)
110423 Shim 5X8X0.1 (10)
110424 Shim 5X8X0.3 (10)
110425 Shim 5X10X0.3 (10)
110426 Shim 5X10X0.5 (10)
110428 Shim 6.5X8X0.25 (10)
110429 Shim 6X11.75X0.2 (10)
110431 Shim 8X11X0.1 (10)
110432 Shim 8X11X0.2 (10)
110433 Shim 12X15X0.25 (10)
110434 Shim 12X18X0.3 (10)
110435 Shim 13X16X0.2 (10)
110436 Shim 3x5x3 (10)
110437 Nut M2.5 (10)
110438 Shim 2.5x6x0.5 (10)
110439 Shim 3x7.5x1 (10)
110440 Shim 2.5x5x0.4 (10)
110441 Nut nylock M3 flanged (10)
110442 Shim 4x8x0.6 (10)
110443 Shim 5x15x0.2 (10)
110444 Nut M4 nylon (10)

110445 Shim 4x10x0.2 (10)
110446 Shim 5x15x0.2 (10)
110447 Shim 3x7x7 (10)
110448 Shim 3x6x6 (10)
110449 Shim 3x6x1 (10)
110450 Nut M2 (10)
110451 Nylock nut M4 flanged alu (10)
110452 Nut M4 flanged knurled (10)
110453 Shim 3x7x3 (10)

TOOLS
190500 Pit-caddy
190501 Tool-bag
190502 Pit-bag medium. 3 drawers
190503 Fuel bottle 500ml
190504 Ballcup tool
190506 Toolset for onroad (17pcs) with Tools bag
190509 Allen wrench 1.5 x 120mm
190510 Allen wrench 2.0 x 120mm
190511 Allen wrench 2.5 x 120mm
190512 Allen wrench 3 .0x 120mm
190513 Ball driven hex wrench 2.0 x 120mm
190514 Ball driven hex wrench 2.5 x 120mm
190515 Ball driven hex wrench 3.0 x 120mm
190516 Tool tip allen wrench 1.5 X 120mm
190517 Tool tip allen wrench 2.0 X 120mm
190518 Tool tip allen wrench 2.5 X 120mm
190519 Tool tip allen wrench 3.0 X 120mm
190520 Tool tip Ball driven hex wrench 2.0x20mm
190521 Tool tip Ball driven hex wrench 2.5x20mm
190522 Tool tip Ball driven hex wrench 3.0x20mm
190523 Turnbuckle wrench 3mm
190524 Turnbuckle wrench 4mm
190525 Turnbuckle wrench 5mm
190526 Flat head screwdriver 3.0 x 150mm
190527 Flat head screwdriver 4.0 x 150mm
190528 Phillips screwdriver 2.0 x 45mm
190529 Phillips screwdriver 3.5 x 120mm
190530 Phillips screwdriver 5.8 x 120mm
190531 Nut driver 5.0 x 100mm
190532 Nut driver 5.5 x 100mm
190533 Nut driver 7.0 x 100mm
190534 Reamer with end cap for lexan body
190535 Exhaust spring / caster clip remover
190536 Wrench-glowplug / clutchnut -10mm long
190538 Flywheel wrench
190539 Nut driver 4.5 x 100mm

MERCHANDISING
1896 Cap serpent black-orange
190172 Winter jacket Serpent black-orange hooded (M)
190173 Winter jacket Serpent black-orange hooded (L)
190174 Winter jacket Serpent black-orange hooded (XL)
190175 Winter jacket Serpent black-orange hooded (2XL)
190176 Winter jacket Serpent black-orange hooded (3XL)
190208 Winter jacket Serpent black-orange hooded (4XL)
190156 Polo shirt Serpent black (S)
190157 Polo shirt Serpent black (M)
190158 Polo shirt Serpent black (L)
190159 Polo shirt Serpent black (XL)
190160 Polo shirt Serpent black (XXL)
190161 Polo shirt Serpent black (XXXL)
190182 T-shirt Serpent Splash white (S)
190183 T-shirt Serpent Splash white (M)
190184 T-shirt Serpent Splash white (L)
190185 T-shirt Serpent Splash white (XL)
190186 T-shirt Serpent Splash white (XXL)
190187 T-shirt Serpent Splash white (XXXL)
190188 T-shirt Serpent Splash orange (S)
190189 T-shirt Serpent Splash orange (M)
190190 T-shirt Serpent Splash orange (L)
190191 T-shirt Serpent Splash orange (XL)
190192 T-shirt Serpent Splash orange (XXL)
190193 T-shirt Serpent Splash orange (XXXL)
190194 T-shirt Serpent Splash black (S)
190195 T-shirt Serpent Splash black (M)
190196 T-shirt Serpent Splash black (L)
190197 T-shirt Serpent Splash black (XL)
190198 T-shirt Serpent Splash black (XXL)
190199 T-shirt Serpent Splash black (XXXL)
190201 Hoody sweater Serpent black-zip (S)
190202 Hoody sweater Serpent black-zip (M)
190203 Hoody sweater Serpent black-zip (L)
190204 Hoody sweater Serpent black-zip (XL)
190205 Hoody sweater Serpent black-zip (2XL)
190206 Hoody sweater Serpent black-zip (3XL)
190207 Hoody sweater Serpent black-zip (4XL))
190215 T-shirt Serpent WC edition black (S)
190216 T-shirt Serpent WC edition black (M)
190217 T-shirt Serpent WC edition black (L)
190218 T-shirt Serpent WC edition black (XL)
190219 T-shirt Serpent WC edition black (XXL)
190220 T-shirt Serpent WC edition black (XXXL)

977 VIPER e

electric powered

www.serpent.com - info@serpent.com