Preparing the Donor Car

1. Remove hood
    a. Save hood hinge bolts
2. Remove intake
    a. Disconnect & remove MAF
3. Remove CCV
4. Clean engine bay if desired, cover throttle body and CCV
5. Drain fuel tank
    a. Depressurize fuel system
        i. Pull fuel pump relay
        ii. Run car until it dies
    b. Disconnect fuel line (may require quick disconnect)
    c. Disconnect fuel line retaining clips (not reused)
    d. Connect hose (¾”) to fuel line
    e. Jumper fuel pump
6. Roll down all windows
7. Remove battery
8. Reinstall fuel pump relay

Stripping the Exterior

1. Chock rear tires
2. Jack front of the car
3. Support with jackstands just to the rear of the doubler
4. Remove the wheels (19mm)
5. Remove front bumper cover
    a. https://www.cobaltss.net/forums/how-guide-43/how-remove-cobalt-front-bumper-43672/
6. Remove inner fender wells (7mm + plastic clips)
7. Remove front fender foam insert
8. Remove front fender (10mm)
9. Remove front fender bracket
10. Remove hood hinges (10mm)
11. Remove windshield wipers
    a. Pull plastic cap
    b. Remove nut (13mm)
    c. Wiggle loose
12. Remove cowl
13. Remove wiper motor bolts (10mm x3 each)
14. Flip wiper motors to disconnect wiring
15. Remove upper dash bolts under cowl area (10mm)
16. Remove door connector grommet and disconnect door connector
17. Remove door stop (10mm)
18. Remove door hinge bolts (13mm x4)
19. Remove door
20. Slide and tilt seat forward and remove rear mount bolts (15mm)
21. Tilt seat backwards and tilt to disconnect harness and remove

Stripping the Front Suspension

1. Break free the axle nuts (30mm)
2. Drain the brakes
3. Disconnect brake hardlines
4. Remove steel retaining clip
5. Remove caliper
6. Remove rotor retaining clips
7. Remove the rotor
8. Disconnect sway bar endlink (18mm)
9. Install strut spring compressors
10. Jack up bottom of strut and compress slightly
11. Remove top strut nut (21mm)
12. Remove lower strut bolts (18mm) and tap to remove
13. Pry the bottom of the strut away from knuckle and remove strut
14. Remove axle nut (30mm)
15. Tap axle free from bearing hub
16. Remove ball joint clamp bolt (15/16mm)
17. Remove knuckle from ball joint
18. Remove bearing hub (15mm x4)
19. Discard brake dust shield
20. Reinstall axle nut and washer
21. Remove trans fill plug then drain transmission fluid
22. Disconnect coolant overflow drain line from motor and overflow tank (keep the line)
23. Remove passenger side radiator mount to access radiator petcock, then drain coolant
24. Have a professional remove refrigerant from AC lines
25. Disconnect AC lines from condenser (13mm)
26. Remove AC line near intake manifold (13mm) then pry lines apart
27. Spray steering shaft with penetrating oil then remove bolt (13mm)
28. Remove plastic clip from drivers side rad mount then remove the mount
29. Remove undercarriage side panels L+R (10mm)
30. Place 2x4 and jack under front control arm pivot points
31. Remove rear trans mount bolts (15mm)
32. Remove rear subframe bolts (21mm)
33. Remove control arm bolts (15mm) then remove control arm
34. Remove front transmission mount bolts (21m)
35. Lower subframe until it hangs on the steering shaft
36. Split the steering shaft
37. Drop the subframe
38. Remove the steering rack (18mm)
39. Remove the swaybar (15mm)

Dropping the Powertrain

1. Disconnect the powertrain control module(s)
2. Remove the ECM
3. Remove positive cable from fuse block (10mm)
4. Release power steering plug with a screwdriver
5. Loosen the 5 multiplugs (7mm, extra rotations required to free threads)
6. Press each multiplug bolt down to release fuse block
7. Pry 4 lock tabs with screwdriver to remove fuse block
8. Remove 5 multiplugs with a firm grip or screwdriver and gentle pressure
9. Snip or otherwise remove any other wireties or clips holding fuse block in place
10. Loosen lower fuse block housing bolts (13mm)
11. Pry/clip off fuse box push nuts
12. Remove the fuse box housing
13. Cut the wire clamp near the top of the overflow tank
14. Disconnect the lower hose
15. Pry the lock tab to give it more clearance, then pry out the tab to remove the tank
16. Remove the drivers side headlamp harness (10mm ground) then disconnect plug
17. Pry the wire clamp away from core support and remove ground (10mm)
18. Cut the wire clamp near the washer fluid bottle
19. Disconnect washer fluid tank and horn electrical connectors
20. Remove horn
21. Remove the starter ground from left frame rail (13mm)
22. Remove wire clamps from core support including airbag sensor in the center
23. Pry out wire clamps from passenger side of core support
24. Remove the headlamp harness
25. Free the plug from the firewall near the brake reservoir and disconnect it
26. Remove the wiper motor plug from the firewall
27. Remove the plug from the brake reservoir
28. Remove ground near hood prop mount (10mm)
29. Squeeze the two stainless tabs together then pull straight up to remove transmission cable housing
30. Pull straight up to remove transmission cable end
31. Remove the evap line by pressing on the whie plastic lock
32. Remove brake booster line from intake manifold
33. Move wires and hoses away from engine
34. Cut the heater hoses with snips or a sharp knife (catch fluid under car)
35. Separate exhaust under car
36. Place a dolly under the engine with 2x4s for added height
37. Attach chain to lift hooks on cylinder head
38. Hook chain over #3 coil pack and add tension
39. Remove 3 bolts on engine side mount
40. Remove 3 bolts on transmission side
41. As engine is lowered, check that everything is clear and disconnected

Removing the Interior and Dash

1. Clean/vacuum the interior
2. Pry up and remove the parking brake cover
3. Pry off the rear molded cupholder
4. Lift up the rear of the shifter cover
5. Disconnect the rear accessory plug
6. Lift the shifter cover and turn it over, disconnect the front accessory plug
7. Remove the front tunnel covers
8. Remove the plastic frames and center console screws (7mm)
9. Remove the center console
10. Disconnect the BCM connectors, remove 3x screws (7mm)
11. Disconnect multi plug on back of BCM (7mm)
12. Use a screwdriver to disconnect shifter cable end, pry off metal retaining clip, disconnect shifter cable housing by prying one side at a time
13. Disconnect shifter wires
14. Remove shifter mount (13mm), remove the shifter
15. Fold down rear seats
16. Release pivot retaining clip with a screwdriver
17. Lift up the rear of the bottom cushion, push backwards to release
18. Remove the lower door trim
19. Remove the rubber door seal
20. Remove the seat belt bolts (T50)
21. Pry open the pillar trim panel covers, remove trims crews (7mm) and remove trim pieces
22. Pry down the rear pillar panels
23. Cut the plastic retaining cable
24. Pop off the upper side plastic panel
25. Pop of the lower side plastic panel
26. Pry off the seat belt guide and disconnect the seat belt plug
27. Remove the seat belt reel
28. Lift the front edge of the caret
29. Fold the carpet over itself
30. Remove the carpet
31. Pry up the upper dash cover enough to access the light sensor, turn ccw to release it
32. Remove inner bolts 2x (10mm)
33. Remove the bolts near A pillars (13mm)
34. Pry off the side covers
35. Disconnect the yellow airbag connects with a screwdriver
36. Disconnect black multi plug and antenna wire
37. Remove the dash bolts (13mm)
38. Pull of the plastic knee panel
39. Disconnect the trunk release connector
40. Disconnect the main dash multi plug
41. Use wire cutters to free the multi plug from the dash

42. Remove center dash supports (10mm)
43. Tie the BCM plugs out of the way
44. Disconnect the AC lines in the engine bay
45. Pry off and reroute the hoses and lines
46. Disconnect the vacuum hose (keep this!)
47. Remove the brake lines (13mm wrench)
48. Remove the master cylinder (13mm socket)
49. Pry the power steering wire off the firewall
50. Remove firewall nuts (10mm)
51. Pry the dash firewall away from the body firewall
52. Collapse the steering shaft and turn the knuckle out of the way
53. Lift both sides of the dash and pull it towards the back fo the car
54. Remove the dash from the drivers side of the car

E1
every gobbling kit car starts with a
Chevrolet Cobalt donor car this donor is
a 2010 that we bought for just over a
thousand dollars it's a base model
automatic with 155 horsepower and it
only has 46,000 miles there are a few
things to do before you can start
stripping the donor car you should make
sure the engine runs well before
disassembling your donor if you have any
trouble ask for help on our forum while
the engine is running it's a good idea
to test as many things as you can test
for in Reverse to see if the
transmission grabs
test the turn signal switch and make
sure the turn signal cancels when you
steer if it does not cancel you'll need
a new turn signal switch for your Goblin
use the info button on your string wheel
to cycle through until you see the
coolant temperature display in a
well-ventilated area bring the coolant
temperature up to at least 170 degrees
let the car sit for a few hours and
check for leaks on the ground the next
step is to remove the hood disconnect
the upper end of the hood prop strut a
thin knife works well to lift the
retaining clip use a thirty millimeter
socket to remove the hood hinge bolts do
not throw away the hood hinge bolts say
vary fastener you removed from the donor
with the hood out of the way
disconnect the lower end of the hood
prop strut clear debris from around the
oil cap with compressed air or a vacuum
remove the oil cap and temporarily plug
the filler neck with a paper towel
to remove the plastic engine cover lift
the rear passenger-side corner to pop it
off the mounting post do the same with

the front driver side corner take the
paper towel out of the oil filler neck
and reinstall the oil cap loosen the
clamp that holds the outlet duct to the
throttle body do the same with the clamp
that holds the outlet duct to the air
filter box push the outlet duct bellows
off of the air filter box slide the
crankcase vent hose clamp back lift the
out the duct to disconnect it from the
throttle body to disconnect the mass
sensor
slide the gray light back then use your
thumb to squeeze the black release tab
remove the two screws holding the MAF
sensor and slide the sensor out save the
math sensor use a 10 millimeter socket
to remove the two nuts holding the air
filter box then pull the box up to
remove it carefully clear any debris
that has fallen on the butterfly take
the car outside to clean the engine
compartment
before spraying the inching apartment
sill if the throttle body and valve
cover event we use a spray can lid and
electrical date for the throttle the
know no cars crankcase vent hose and a
bolt can be used as Scylla Valkyr event
pre-soak the engine bay with a degreaser
then rinse with high-pressure look for a
pressure washer rental in your area
take the donor back inside and let it
dry to depressurize the fuel rail you'll
need to disable the fuel pump start by
removing the fuse box lid then remove
the fuel pump relay start the engine and
let it run until it dies be sure to have
a fire extinguisher nearby when you
empty the fuel tank
check the fuel level to see how much
fuel you'll be pumping out before
disconnecting the fuel line make sure

your work area is well ventilated
private metal retaining clip offer the
fuel line use a 3/8 angle disconnect
tool to disconnect the flexible fuel
line
pry open the fuel line routing clips you
won't be reusing the fuel line so don't
worry about damaging it connect a hose
to the fuel line 3/4 inch heater hose is
a good fit use a hose clamp to hold it
in place run the hose to an empty fuel
container keep in mind how much you will
be emptying from the tank use a short
piece of wire to jump the fuel pump
remove the jumper when the fuel stops
flowing and then remove the hose from
the fuel line before removing your
battery roll down all your windows this
will keep you from accidentally locking
yourself out and it will make the door
easier to remove later use a 10
millimeter socket to remove the battery
cables start with a ground cable
remove the battery hold-down straps with
a 13 millimeter socket save the battery
for your goblin reinstall the fuel pump
relay at this time in the next video
we'll remove the doors seats and more

E2
part two of our build guide focuses on removing exterior pieces of the donor car start by getting the front of the car up on jack stands
be sure to chock the rear tires place the jack stands just behind the doubler if you place your stands too far back the car will be nose-heavy and unstable
the stock hub caps are held on by plastic nuts use a 19 millimeter socket to loosen them use the same socket to remove the front tires the front bumper of our car was torn off when it was wrecked if yours are still attached follow the how-to guide in the link at the bottom of the screen to remove yours
to get to the fender bolts the inner fender well has to be removed start by taking out the inner fender well screws with a seven millimeter socket the rest of the inner fender well is held by plastic clips you don't need to keep these so just use a hammer and a paint scraper to break them there are three along the back and two at the top
[Music]
pull down on the inner fender well to remove it pull out the foam insert the back of the fender use a 10 millimeter socket to remove the fender bolts there are two bolts at the bottom and one behind the fender you'll have to open the door to get to one boat work your way around the fender taking out the rest of the bolts until the fender is free after removing the fender take off the front fender bracket use a 10 millimeter socket to remove the hood hinges to remove the windshield wipers pry the plastic cap off and use a 13 millimeter socket to remove the nut lift the windshield wiper arm and wiggle it

back and forth to break it loose repeat
the process for the other windshield
wiper use a hammer and a paint scraper
to break the plastic clips on each side
of the cow
[Music]
then lift the plastic cow grill up to
pop it loose and remove it from the car
[Music]
take out the three wiper motor bolts
with a ten millimeter socket turn the
motor assembly over to make it easier to
get to the electrical connector use a
screwdriver to pry down the lock and
pull the connector loose remove the two
upper dash bolts with a ten millimeter
socket removing the doors will make
stripping the interior much easier start
by prying out the door conduit cover and
disconnecting the door plug stuck the
plug back into the car next use a ten
millimeter socket to remove the bolt
that holds the doorstop to the car close
the door all the way to use a thirteen
millimeter socket to remove the four
door hinge bolts the door should stay
upright on its own reach through the
window and grab the armrest to lift the
door be sure to click all the fasteners
you've removed many of them will be
reused during your goblin build lean the
seat forward and slide it to the front
so you can get the seat bolts under the
back of the seat use a 15 millimeter
socket to remove the two bolts
[Music]
pull the seat back to unhook the front
of the rails lean the seat over and
disconnect the connector under the seat
then remove the seat in the next video
we'll disassemble the front suspension
and drop the powertrain out of the donor

E3
in part three of our bill guide we remove the front suspension and drop the subframe draining the front brake lines will prevent a big mess later start by removing the lid from the reservoir uncover the brake bleeder and place a 10 millimeter wrench on it attach the vacuum hose and open the bleeder this vacuum pump will be used again in the future when it comes time to bleed your brakes pump the handle to create a vacuum in the line you will see the fluid flowing out into the pumps reservoir when the brake fluid stops coming out tighten the bleeder and remove the hose don't forget to reinstall the bleeder cap use a thirteen millimeter wrench to disconnect the steel brake line then use pliers to pry out the still retaining clip you'll use the clip later so don't throw it away steer toward the side you are working on to make it easier to get to the caliper bolts use a 15 millimeter socket to take out the caliper bolts and remove the caliper pry out the rotor retaining clips with a paint scraper and screwdriver then use wire cutters to break the clips off remove the rotor use an 18 millimeter socket to disconnect the sway bar link
install stretch spring compressors on the front and rear the spring don't worry about tightening the compressors finger tight is good enough put a jack under the ball joint and raise it up until the spring compresses slightly use a 21 millimeter socket to remove the top strut nut then use an 18 millimeter socket to take the nuts off the lower strut bolts tap the strut bolts out don't hammer directly on the end of the

strut bolts pry the bottom of the strut away from the knuckle and remove the strut use a 30 millimeter socket to remove the axle nut this nut is very tight
tap the axle free from the bearing hub don't hammer directly on the end of the axle
use a 15 millimeter and a 16 millimeter socket to remove the ball joint clamp bolt lift the knuckle off of the ball joint use a 15 millimeter socket to remove the bearing hub bolt discard the sheet metal shield to keep the knuckle bearing hub and bolts reinstall the axle nut and washer use a 10 millimeter socket to remove the transmission fluid check plug near the bottom of the automatic transmission with a manual transmission look for a drain plug on the side of the pan drain at least one quart of transmission fluid so that when you pull the axles later you won't make a mess on your floor
reinstall the plug and wipe excess transmission fluid you can clean up more thoroughly after the powertrain is removed from the car disconnect one end of the overflow line from the cylinder head disconnect the other end from the overflow tank do not throw away the overflow line use a thirteen millimeter socket to remove the passenger side radiator mount to make it easier to get to the radiator drain plug open the plug and drain the coolant system
it is illegal and dangerous to vent the AC system yourself you should have a professional recover the refrigerant before disconnecting the AC lines after the AC system is emptied use a 13 millimeter socket to disconnect the lines from the condenser use the same

socket to disconnect the AC line up near the intake manifold then use a screwdriver to pry the lines apart soak the steering knuckle and shaft with penetrating oil then use a thirteen millimeter socket to remove the steering knuckle bolt use a hammer and a paint scraper to break the plastic clip on the driver side radiator mount then use a thirteen millimeter socket to remove the mount use the hammer and paint scraper again to break the plastic clips holding the side panels the passenger side panel is also held by bolt use a ten millimeter socket to remove it put a jack and a two before under the subframe line the board up with the front pivots of the control arms use a 15 millimeter socket to remove the rear transmission mount bolts use a 21 millimeter socket to remove both of the rear subframe bolts
use a 15 millimeter socket to remove the control arm bolts and then pull the control arm out use an 18 millimeter socket to remove the front transmission boat use a 21 millimeter socket remove both of the front subframe bolts lower the jack just until the subframe hangs on the steering shaft hammer a screwdriver up into the steering knuckle split as you hammer the subframe should drop lower the subframe down and pull it out from under the car use an 18 millimeter socket to remove the steering rack
use a 15 millimeter socket to remove the sway bar in the next video we'll clear out the inch an apartment and pull out the powertrain

E4
in part four of our build guide we
remove accessories from the engine bay
and drop the powertrain start by
removing the powertrain control modules
unlock and disconnect the TCM connector
by pushing in on the black tab and
flipping the gray lever push the plastic
tabs out of the way to remove the TCM
next disconnect the ECM plugs slide the
red lock tab out push the black tab in
and then move the black lever over
repeat this process for the lower easy
unplug remove the ECM use a ten
millimeter wrench to remove the positive
cables from the fuse block use a
screwdriver to release the power
steering plug
[Music]
use a seven millimeter socket to loosen
the five multi plugs you will need to
spin the bolts a few extra turns to
allow them to fully disengage from their
threads next press each bolt down to
free the plugs from the fuse block now
remove the fuse block by carefully
prying out the four lock tabs with a
screwdriver use a firm grip or a
screwdriver to remove the five multi
plug from the housing free any remaining
cables that are connected to the fuse
block housing
[Music]
use a 13 millimeter socket to loosen the
two bolts located at the lower front of
the fuse box housing prop the push nut
with a screwdriver and then remove it
with wire cutters use a pry bar to
remove the remaining push nut remove the
fuse box housing next we are going to
remove the coolant tank start by cutting
the wire clamp near the top next remove
the hose clamp from the bottom of the

coolant tank use a large screwdriver to
give the lock tab more clearance then
pry out the tab and remove the tank now
we need to remove the headlamp harness
use a 10 millimeter socket to remove the
ground and then disconnect the plug next
to it
pry the wire clamp away from the core
support then remove the ground wire near
the washer fluid cap reach through a
hole in the front of the core support
and cut the wire clamp located near the
washer fluid bottle disconnect the wires
from the washer fluid bottle and the
horn remove the horn remove the ground
wire from the left frame rail the core
support of your donor is probably still
intact so work your way across it
removing wire clamps as you go unplug
the yellow plug from the airbag sensor
at the center of the core support prop
the wire clamps for the passenger side
of the core support
remove the headlamp harness free the
plug from the firewall near the brake
reservoir and disconnect it remove the
wiper motor plug from the firewall
remove the plug from the brake reservoir
use a 10 millimeter to remove the ground
near the hood prop mount squeeze the two
stainless tabs together and then pull
straight up to remove the transmission
cable housing pull straight up to remove
the transmission cable end remove the
evap line by pressing on the white
plastic lock use pliers to remove the
brake booster vacuum hose from the
intake manifold now is a good time to
move some of the wires and hoses out of
harm's way it will also make it easier
to see what we are working on next
[Music]
now we need to cut the heater hoses that

run from the engine to the firewall coolant will drain from these hoses so you will need to place a container under the car use tin snips or a sharp knife to cut the hoses near the firewall next we'll be separating the exhaust near the middle of the car use a 15 millimeter socket to remove the two nuts and then pull the exhaust apart push a dolly under the engine and transmission as shown and centered left to right place to two befores on each side to give the dolly enough height to clear the legs of an engine hoist attaching lengths of chain to the two lifts hooks located on the cylinder head place the hoist over the engine being careful not to move the dolly underneath click onto the chain above the number-3 coil pack start lifting the engine Attila has a fair amount of force on it remove the three bolts on the engine side as you get close to removing the last bolt it should start to feel loose if not you may need to lift the engine a little more remove the bolts on the transmission side again as you get close to removing the last bolt
it's just start to feel loose if not you may need to lift the engine a little more as you lower the powertrain constantly check around it to make sure everything is loosened clear lower the engine down until it sets flat on the dolly and the chain is loose remove the engine hoist and roll the powertrain out in the next video we'll strip out the interior of the donor and remove the dash

E5
in part five of our bill guide we
stripped the interior of the donor and
pull out the - you will be spending
quite a lot of time inside of your donor
so it is a good idea to clean and vacuum
the interior before you start be careful
of shards of glass as you take out the
large bits of trash use a vacuum for the
small debris we will start stripping the
interior by removing the center console
remove the parking brake cover by prying
up the rear with a screwdriver then pry
up the rear molded cup holder next lift
the rear of the shifter cover just
enough to get to the rear accessory plug
underneath disconnect the rear accessory
plug now lift the cover over the shifter
and turn it upside down to access the
front accessory plug disconnect the
front accessory plug and remove the
panel from the donor pull the front
tunnel cover off of the passenger side
this cover has a schematic of the BCM on
it so you'll want to save it remove the
driver side cover use a seven millimeter
socket to remove the plastic frames from
the passenger and driver sides use the
seven millimeter socket again to remove
the four screws that hold a main tunnel
cover
disconnect the two BCM plugs by first
squeezing just ahead of the gray lever
and then flipping the liver use a seven
millimeter socket to disconnect the red
multi plug
remove the three BCM screws using a
seven millimeter socket turn over the
BCU and remove the gray multi-plug using
the same seven millimeter socket use a
screwdriver to pry the cable end off of
the shifter post remove the u-shaped
retainer and then press the tabs in to

disconnect the cable from the shifter housing
unplug the wires that go to the shifter
use a 13 millimeter socket to remove the four nuts holding the shifter to the tunnel pull the levers located inside the trunk to allow the seatbacks to fold down use a screwdriver to release the retaining clips located at the outer pivots of the seatbacks pull up on the rear of the bottom seat cushion to free it from under the black seat row with the rear angled up push the front of seat backwards to release them remove the lower plastic door trim remove the large rubber door seal use a good-quality t-50 Torx socket to remove the seatbelt bolts you may need to use a cheater pipe or a break over bar to loosen them make sure you keep the socket as straight as possible an even pressure can break the teeth off of your socket use a screwdriver to remove the cover to gain access to the upper bolts using knife or a small screwdriver to open the covers at the top of each pillar use a seven millimeter socket to remove the screws that hold the a-pillar covers on it remove the a pillar covers by pulling the top out and then up toward the roof if the rear cover has a screw remove it using a seven millimeter socket and then pull the cover free some models have a plastic cable holding the cover use wire cutters to cut this cable use a seven millimeter socket to remove the bolt at the top of the cover and then remove the cover then remove the lower cover repeat this process on the other side of the donut use a prop bar to remove the steel seat belt guide the seat belt connector can be disconnected using a knife or a thin screwdriver you

will need to use the t-50 Torx socket again to loosen the bolt holding the seat belt mechanism
remove the carpet from the donor be careful of any shards of glass or sharp debris that might have been missed by the vacuum cleaner earlier
private up or - cover-up just enough to access the lot sensor disconnect the sensor from the cover by turning it counterclockwise using a deep 10 millimeter socket remove the two bolts located on either side of the center defrost revenge
the boats at the base of each a pillar are hard to get to start with a 3 H Drive 13 millimeter socket when the head of the ratchet touches the a pillar swap to a quarter inch drive 13 millimeter socket use the screwdriver to pry the cover off of the end of the dash disconnect the yellow airbag plug by pulling the safety lock and pushing on the clip with a screwdriver pull out and disconnect the black multi plug do the same with the antenna wire stuff both back into the dash use a 13 millimeter socket to remove the two bolts from the dash use a 10 millimeter socket to remove the bolt at the bottom corner of the dash repeat this process on the other side of the dash remove the plastic neat panel located below the steering assembly use a knife or a small screwdriver to disconnect the trunk release connector pull out the main dash multi-plug and disconnect it by squeezing the black tabs and then flipping the white handle over
use wire cutters to free the multi-plug wiring from the - use a ten millimeter socket to remove the center - support there is one on each side of the tunnel

use zip ties to keep the BCM plugs up
and out of the way use a 13 millimeter
socket to remove the nut in the center
of the AC lines remove the upper AC line
and bend the lower AC line out of the
way pry the fuel line off the dash
firewall and move it out of the way move
the evap line out of the way pry the
brake line free from the dash firewall
and push it down use pliers to remove
the brake booster vacuum line
use a 13 millimeter wrench to remove the
brake lines from the master cylinder
remove the master cylinder using a 13
millimeter socket place the self locking
nuts back on the booster for later use
pry the power stringing wire off of the
firewall remove the seven firewall nuts
using a 10 millimeter socket pry the
dash firewall away from the body
firewall push the collapsible steering
shaft out of the way
with one person supporting the - on each
side pull the - back and lower it down
remove the dash from the driver's side
of the donut in a next video we'll
remove the main wiring harness from the
donor and strip the dash

E6
in part 6 of our build guide we remove the main wiring harness from the donor car start by pulling out the firewall bedding disconnect the door jar sensor located in the frame behind the plastic cover use a pry bar to free the front passenger side wiring from the donut disconnect the air bag control module by sliding the red lock tab out and the brown slider over use a 10 millimeter socket to remove the console mount use the same 10 millimeter socket to remove the ground near the parking brake disconnect the parking brake sensor plug by using a knife or a small screwdriver free the wiring harness from the crossover from the engine bay use a 10 millimeter socket to remove the shifter cable
use a screwdriver to pop out the large main harness grommet one-by-one guide the engine bay plugs through the firewall pull the positive battery cable through the firewall disconnect the driver's side door ajar switch and then pry the front driver's side wiring harness spring from the donor if your donor is a coop unplug the backup lights from the trunk lid use a 10 millimeter socket to remove the center brake light nuts
push in on the two plastic tabs to release the brake light from the trunk lid use it now for a small screw driver to disconnect the plug find the thin metal lock retainer inside the trunk lid and slide it toward the passenger side until it comes free lift the lock mechanism and remove it from the trunk lid use a ten millimeter socket to remove the three bolts holding the trunk latch next press the two tabs down and

push the latch through the trunk lid now use a knife or a small screwdriver to disconnect the latch plug work your way across the trunk lid freeing the wiring harness
if your donor is a coop use a Phillips head screwdriver to remove the side marker lights
remove the plastic nuts and pull out the carpet from both sides of the trunk pull out the driver side marker light wiring use wire cutters to cut the license plate wires use a screw driver to unplug the rear speakers pull back on the trunk lock to release it and use a small knife or a screwdriver to disconnect the plug disconnect the passenger side taillight and cut the antenna wire use a thirteen millimeter socket to remove the ground cable and sensor use a screwdriver to disconnect the BCM power cable
work your way across the back of the trunk cutting the plastic clips to free the harness
disconnect the driver side taillight cut the rear seatbelts to get them out of the way
use a thirteen millimeter socket remove the headrest pull on a package tray cover to release it
unplug the XM radio module use a ten millimeter socket to remove the two grounds from the package tray use a ten millimeter socket remove the OnStar module disconnect the wiring harness from the OnStar module
work your way toward the driver side freeing the harness as you go disconnect the black headliner plug disconnect the rear defroster wire use a screwdriver to disconnect the driver side airbag remove the access cover and pull the trunk wires into the cabin do the same for the

passenger side wire cut the wiring harness near the fuel pump Junction remove the main wiring harness from the donor and store it with your other donor pieces
eat the 15 millimeter socket to remove the for rear-seat support hope you'll be reusing these bolts in your Goblin in the next video we'll disassemble the steering column and strip the dash

E7
in part seven of our bill guide we disassembled a steering column and strip the - with the - upside down
disconnect the two outer plugs from the power steering module use a seven millimeter socket to remove the six screws embrace near the column use a thirteen millimeter socket to remove the three bolts that secure the column to the - use a seven millimeter socket to remove the lower covers from the column reinstall two of the screws into the ignition switch disconnect the ignition switch plugs
disconnect and remove the turn signal switch disconnect and remove the wiper switch disconnect the air bag and steering wheel controls
remove the steering column from the dash use a 13 millimeter socket to remove the collapsible steering shaft use wire cutters to peel off the metal boot clamp
[Music]
separate the large rubber boot from the smaller seal and slide it off the shaft using wire cutters cut through one-half of a smaller seal and remove it use a 10 millimeter wrench to separate the power string unit from the column tube
reinstall the bolts into the unit push a small rod or allen wrench into the holes on the back side of the steering wheel cover to release the airbag pinch the tabs on the airbag plugs to remove them use a 21 millimeter socket remove the steering wheel nut hammer the back of the steering wheel to release it from the steering shaft make sure you are heating against the wheel frame you can also ran a stream wheel puller from your local parts supplier use a screw driver or a pry bar to pry the metal strap over

the rectangle boss
[Music]
pry the strap away from the column turn
the key to the run position to unlock
the ignition switch rotate the strap
back and forth while loosening the
security shear bolt to remove it an
alternate way is to cut a slot in the
head of the boat and use a flat blade
screwdriver using wire cutters Ben the
bearing retainer stakes out of the way
use snap ring pliers to remove the snap
ring and then push the steering shaft
through use the steering shaft to knock
the bearing out of the housing
temporarily replace the bearing snap
ring and nut
use a 10 millimeter socket to disconnect
the brake booster from the pedal replace
the foam spacer and net use a 13
millimeter socket to remove the locking
nuts that attach the brake booster
replace the locking nuts on the brake
booster remove the power steering wiring
harness using a 13 millimeter socket
remove the bolt and leg the pedal
assembly on its side disconnect the
throttle pedal position sensor and the
brake light switch use a screwdriver to
remove the obd2 plug from the dash use a
screwdriver to pry off the trim plates
across the front of the dash disconnect
any wires that attach to the trim plates
[Music]
use a screwdriver to remove the center
bezel disconnect the passenger airbag
warning lamp use a seven millimeter
socket to remove the radio from the dash
disconnect the antenna and plugs from
the radio
[Music]
use a seven millimeter to remove the
climate control switches disconnect the

three plugs from the climate control
[Music]
open the glove box and use wire cutters
to cut the descent control string on the
right remove the glove box
[Music]
use a seven millimeter socket to remove
the screws holding the dash cover open
the cover located in the glove box area
use a ten millimeter socket remove the
bolts holding the passenger airbag
separate the dash cover from the dash
far enough to gain access to the hazard
light plug use a knife or a small
screwdriver to disconnect the hazard
light plug disconnect the harness from
the gauge panel use a seven millimeter
socket to remove the four screws
attaching the gauge panel use a seven
millimeter socket to remove the air
ducts
use a knife or a small screwdriver to
disconnect the light sensor step out the
key fob high pressure monitor and
disconnect it using a seven millimeter
socket work your way across the dash
removing any remaining screws use a ten
millimeter socket to remove the four
nuts across the fire remove the three
Phillips screws near the bottom use a
seven millimeter socket remove the
screws attaching the glovebox loop tap
the plastic - support structure away
from the steel frame and remove it using
wire cutters work your way across the
steel frame freeing the harness
[Music]
use a 10 millimeter socket to disconnect
the wiring harness grounds collect and
sort the fasteners in the next video
we'll strip the rear of the car and drop
the fuel tank

E8
in part eight of our build guide we strip the rear of the car and drop the fuel tank use a 19 millimeter socket to remove the rear tires use a mallet to knock the brake drums loose and remove them from the bearing hubs use a jack to raise the trimming arm until the spring compresses use an 18 millimeter socket to remove the upper shock rope lower the jack and remove the coil spring use a 15 millimeter socket to remove the forbearing hub bolts
remove the bearing hub and reinstall the nuts before removing the brake lines you should drain them with a vacuum pump see part three of our build guide for more info on this process use a thirteen millimeter wrench to loosen the tube nuts that are threaded into the rubber brake lines
[Music]
prop the steel retaining clips and remove the rubber lines disconnect the vent and evac cannister lines by squeezing the release buttons disconnect the fuel pump wires from the fuel pump Junction cut the wires going to the evac canister
use a 10 millimeter socket to remove the fuel filter use a 3/8 disconnect tool to disconnect the fuel line tip the filter over to drain it squeeze the release buttons on the nylon lines to free the fuel filter drain the other end of the fuel filter and the nylon lines
[Music]
loosen the fuel filler hose that has slipped over the steel filler neck use a 13 millimeter socket to remove the tank straps if you didn't it be the tank earlier it could be very heavy at this point after removing the straps type the

filler hose fuel lines and wires over
the rear axle beam and pull down the
passengers out of the tank push the tank
around to get it to drop past the
exhaust
use a t30 torx socket to remove the
filler neck screws remove the fuel cap
tether by using a small piece of tubing
to collapse the retaining barbs on the
backside use a hammer and a paint
scraper to break the inner fender well
clips on the driver side of the donor
use a 10 millimeter socket to remove the
single fender well bolt work your way
across the outer edge with a scraper or
a screwdriver to free the inner fender
well
use a 10 millimeter socket to remove the
fuel filler neck mode remove the filler
neck and reinstall the screws and fuel
cap carefully remove the plastic fuel
lines from the tank try not to put too
much force on the plastic lines near the
fuel pump disconnect the fuel pump
harness use a hammer and a screwdriver
to unlock the fuel pump retainer lift
the pump out of the tank
if your donor was a lower emission car
your pump will be attached to the floor
of the tank you will need to buy a
standard cobalt pump for your Goblin be
sure to save the rubber o-ring under the
pump to get your donor shell out of your
garage lower it down onto a large
furniture dolly check with scrap yards
in your area to get your donor leftovers
hauled off most yards will haul it off
for free
you'll be reusing many of the pieces
that have been pulled from your donor
check out our website for a
comprehensive list of all of the pieces
you need to save in the next video we'll

get started on adapting the donor wiring harness for the Goblin

E15
in part 15 of our build guide we clean paint and prepare the donor parts get the brake booster ready to wash by first removing the foam early model boosters only have one piece of foam late model boosters have an additional piece of foam underneath the aluminum spacer after removing the foam reinstall the spacer and nuts
next install the master cylinder to keep water out of the booster while you wash it slide the vacuum hose onto the fitting and plug the end pry the brake pads out of the front calipers from your donor
cap the fuel rail to keep water out also cover the throttle body and valve cover event like you did before while stripping the donor if your car is an automatic disconnect the transmission lines by prying out the clips
[Music]
next this can make both radiator hoses
[Music]
lay the radiator down and disconnect the fan type up the ends of the transmission lines to keep out water and debris
Sok the donor parts with a detergent like super clean we like to start with full concentration from a spray bottle then we use the dispenser on the power washer to soak the parts again finally we use high pressure to rinse the parts
pry out the axles to remove them spray the o2 sensor with penetrating oil pull out the o2 sensor lock and disconnect the plug
do the same for the second o2 sensor use a 22 millimeter wrench to remove the first o2 sensor save the sensor to use later in your Goblin use a 15 millimeter socket to remove the exhaust flange nuts

the studs might come out with the nuts
if they do soak them in penetrating oil
afterwards so you can loosen them later
remove both heater hoses it helps to
break the hoses loose by pinching them
with the pliers
[Music]
trim the first heater hose to loop the
two heater tubes
disconnect the evap line from the valve
and intake manifold use a 10 millimeter
socket to remove the evap valve take off
the oil filler cap and twist the filler
neck extension to remove it then
reinstall the cap use a 10 millimeter
socket to remove the transmission lines
use a 13 millimeter socket to remove AC
lines
use a 3/8 ratchet to remove the
serpentine belt disconnect the AC
compressor plug and use a 13 millimeter
socket to remove the bolts remove the
upper radiator hose use a 13 millimeter
socket to remove both of the lift loops
remove the coolant overflow hose use a
15 millimeter wrench to disconnect the
powertrain ground
reconnect the starter ground and tighten
the nut
cut the tape around the power train
ground to remove it unwrap and untangle
the map sensor wires to the other end of
the valve cover
[Music]
[Music]
[Music]
take the map sensor wires
cover and tape the wires along the valve
cover
you
type the speed sensor wires
[Music]
use a 10 millimeter socket to remove the

fuel line bracket remove the bellows and disc cover from the strut
then tape the shaft to keep it from getting painted
[Music]
repeat for the other strut
[Music]
mark the springs one round up from the bottom clamp the springs and cut on your mark you can use a grinder hacksaw or torch to cut the spring type the brake booster opening vacuum line fitting and push rod bellows use a seven millimeter socket remove the brake pedal position sensor the position since your vary depending on the donor use a 10 millimeter socket to remove the throttle pedal pull off the brake pedal pad remove the foam and nut from the brake pedal mark the fuel filler neck just before it narrows down
[Music]
mark the vent tube as shown clamp the filler neck to the table and cut it your marks
[Music]
deeper the tubes
[Music]
[Music]
the battle in the filler net will cause the tank to feel slowly late-model baffles like this one are easy to knock out early model baffles are built-in and will have to be cut out or replaced with a late-model fuel NIC hang and paint the donor parts
this is also a good time to paint the engine pulleys and valve cover in the next video we'll unpack and prepare the first stage kit parts

E16
in part 16 of our bill guide we install some sheet metal and the main coolant hoses the stage 1 kit includes all of the pieces to get your donor engine installed and cranked up start by unpacking the parts that need to be painted this includes the sheet metal fuel tank for support strap and some smaller hardware all of the provided fasteners are zinc plated so they don't need to be painted clean the parts before painting them we use rattle cans to paint the smaller pieces and powder coat the larger pieces flip the frame over onto a piece of foam or a shipping blanket run a drill bit through the rivet holes to clear the paint or powder coat don't forget the four holes near the front X brace most of the holes are 3/16 inch but you'll find quarter inch holes where the force support strap will go apply silicone to the front bulkhead tubes
install the front bulkhead with a bend up and aim toward the rear of the frame insert rivets to hold the bulkhead up then use a rivet gun to pop the rivets a hydraulic Riveter makes the job easier apply silicone to the four tubes the silicone will help prevent the sheet metal from squeaking and rattling install the floor pan with the band aimed into the car then use a rivet gun to install the rivets apply silicone to the floor strap
[Music]
install the floor support strap with the provided hardware you will use a 5/32 allen wrench and a 7/16 socket the main coolant hoses are pulled through the frame rails start by tying the aluminum slug on a rope that is at least ten feet

long insert the slug into the hose and
tighten the clamp about one inch from
the end wait about fifteen minutes
before removing the clamp this will
fresh the hose making the next step
easier spray tire wet onto the hose and
tighten two zip ties where the clamp was
[Music]
pull the zip ties as tight as you can by
hand the zip ties will keep the slug
from pulling out of the hose
cut slits into the end of the hose it
will make it easier to start into the
frame rail to make it easier to pull the
hoses through the frame rails you'll
need to pull swab through to lubricate
the tubes make a swabbing tool by first
tying a knot near the middle of 20 feet
of nylon trimmer line then slide a
quarter inch washer on the line followed
by 6 inch paint roller this roller will
be the swab slide another washer on the
line and tie knot to hold the roller on
[Music]
use the swabbing tool to a plotter wit
to the inside of the frame rail
run it back and forth several times to
make sure the tube is well coated
[Music]
[Music]
take the rope to the trimmer line and
pull it through the frame rail
lube the coolant hose very well pull the
hose to the frame rail from the back of
the frame if the host feels like it is
stuck pull it back out of the front and
recoat it with tar wet pull until six
inches are left at the front cut the
hose at the rear of the frame and repeat
the process for the other frame rail
[Music]
you
you

[Music]
flip the frame over and set it on jack stands and a furniture dolly install the front brake t with the provided hardware mount the donor car's horn with the front brake t used a 5/32 allen wrench and a 7/16 wrench install the other brake t at the rear of the tunnel
[Music]
[Music]
install the rear master cylinder line from the front of the car make sure the line goes on the passenger side of the tunnel screw the tube nut into the brake tee and tighten with a ten millimeter wrench in the next video we'll install the steering rack power string unit and pedal box

E17
in part 17 of our built guide we install the steering system pedal box and brake lines use pieces of the donor cars passenger side radiator hose to protect the frame as you install the steering rack slide the rack into the frame under the battery box
use the supplied hardware to mount the steering rack to the frame
[Music]
pork the hardware 2ne1 foot-pounds with a 19 millimeter socket any wrench use the supplied hardware to install the electronic power steering bracket the bracket needs to be oriented with the bent edge toward the back of the car both the electronic power steering unit to the bracket with the original power steering in it bolts push the donor's intermediate steering shaft onto the steering rack shaft use thread Locker on the provided eight millimeter bolts don't use the 8 millimeter bolt with the machined head
do the same to connect the other end of the shaft to the power steering unit
[Music]
lower the pedal box over the mount on the X brace both the top of the boxes support to with a 8 millimeter bolt and nut from your donor hardware use the supplied 8 millimeter bolt with a machined head and a donor nut to both the lower driver side of the pedal box torque both to 18 foot-pounds install the brake booster with the original nuts
[Music]
torque 218 foot-pounds install the throttle pedal with the original bolts install the brake pedal position sensor
[Music]
connect a brake pedal to the brake

booster push rod
[Music]
[Music]
remove the brake fluid reservoir from
the master cylinder
install a master cylinder with the
original nuts torque to 18 foot pounds
screw the rear master cylinder line into
the front master cylinder port tighten
it with a 13 millimeter wrench install
the front master cylinder line between
the front brake T and the rear master
cylinder port tighten both nuts with the
10 millimeter wrench use a 5/32 allen
wrench and a 7/16 socket to tighten the
front brake T Hardware bend the horn
strap down to give clearance to the
radiator fan and hoses that will be
installed later use a 10 millimeter
socket to loosen the horn nut name the
horn toward the front of the car use a
Philips screw driver to install the self
drilling screws and quarter-inch coated
clamps to hold the rear master cylinder
line one side at a time loop the rear
brake lines over the rear Kage tubes and
screw the tube nuts into the rear brake
t
[Music]
tighten the tube nuts with a 10
millimeter wrench just like at the front
use a Phillips screwdriver to install
coated clamps to hold the brake lines
[Music]
[Music]
slip a short piece of edge trim over the
lower fuel tank rail where the brake
line touches then attach a one-inch
coated clamp to hold the line against
the edge trim do the same for the other
rear brake line the first-stage kit
comes with nylon tubing to extend the
vacuum line from the booster to the

intake the first step is to trim the original vacuum line measure six inches back as shown and cut the hose set this piece aside for now measure two inches further and cut again
[Music]
putting hose clamp on the 2-inch piece of hose and tighten until the hose starts to compress insert one inch of the nylon tubing into the two-inch hose and tighten the hose clamp tighten until the tubing is held firmly remove the original hose clamp from the leftover piece of vacuum hose install the hose clamp on the two-inch piece of hose place the roll of nylon tubing on a passenger floor and guide it up through the tunnel wrap the tubing above the steering rack and slip the two-inch hose onto the brake booster fitting slide the hose clamp up to hold the hose on the fitting take the role of nylon tubing to the back of the floor pan and drape it over the edge in the next video we'll install the BCM gauges and radiator

E18
in part 18 of our build guide we install the main harness - accessories and positive cable seal up the bulkhead by applying silicone around the boat tubes and frame rails
repeat on the driver's side
[Music]
before installing the main harness install edge trim on the front passenger side of the tunnel on the bottom edge of the bulkhead and on the tunnel cap place the main harness on the passenger floor and got the fuse box plugs over the rear brake line
[Music]
lay the harness in the tunnel as you work your way to the front Drake the - wires over the pedal box and pull the front bundle of wires through the bulkhead this bundle should include the headlight plugs radiator fan and other front end wires
[Music]
[Music]
use a quarter-inch drill bit to resize the BCM mount holes connect the BCM plugs use a seven millimeter socket for the largest two plugs latch the gray levers on the blue plugs install the BCM with the supplied hardware using a 5/32 allen wrench and a 7/16 socket
[Music]
[Music]
pull the slack out of the main harness at the rear of the tunnel tuck the wires under the floor pan route the harness on the passenger side of the tunnel divider push the big intersection toward the bulkhead bend the - wires to match the shape of the pedal box use one of the throttle pedal boats and a coated clamp to hold the harness use another clamp

with a donor bolt and nut to hold the harness at the rear of the pedal box connect the throttle and brake pedal wires
[Music]
connect the gauge panel and bolt it to the frame with the supplied hardware the aluminum spacers go between the gauge panel and the frame
use a 5/32 allen wrench and a 7/16 socket to tighten the hardware install the ignition switch with original hardware use a seven millimeter socket to tighten the screws route the power steering wires under the pedal support tube guide the ignition wires between the gauge panel and the frame aim the ground wires toward the pedal box
zip tie the harness to the pedal support tube
[Music]
[Music]
[Music]
remove the bolt from the - ground lugs use the bolt to connect the grounds to the top hole at the back of the pedal box connect the power string wires connect the ignition switch wires
[Music]
zip tie the wires to the dash bar double over excess wire before tying it
[Music]
[Music]
use a half-inch socket to remove the nuts and washers from the ground stud on the battery box leave one of the flat washers on the stud slip the battery ground cable on the stud then install the other flat washer lock washer in one of the nuts check continuity between the ground cable and the - ground lugs pull the front end wires over the steering rack

connect the horn and battery current sensor
[Music]
[Music]
zip tie the wires to the frame double over the excess length of wires use a 7/16 socket to loosen the middle four strap nut you might need to use a 5/32 allen wrench under the car to hold the bolt remove the bolt from the tunnel ground lugs now stop the lugs on the four strap bolt and reinstall the washer and nut check continuity to the battery ground cable
[Music]
use wire cutters to cut the mounting post off the big red fuse holder then using op to cut the leftover plastic
put a strip of double-sided foam tape on the fuse holder and then tape it to the side of the battery box
[Music]
you
[Music]
finished by zip tying the holder to the battery box
measure 8 feet from the red housing on the positive battery cable
if you are building an extended Goblin mark the cable four inches longer cut through the loom and cable go back the loom and strip the end of the cable
[Music]
side of the log to the positive cable
tape up the end of the cable
[Music]
slip the Loom back over the cable and pull it tight cut off excess and take the Loom to the cable
[Music]
install the positive cable from the front of the car brought the cable to the rear of the tunnel lay the vacuum

line on top of the wire harness and zip
tie it all together
[Music]
in the next video we'll install the
radiator hoses in fuel tank

E19
in part 19 of our build guide we install
the radiator and filled tank install a
one and a half inch splice into the main
coolant hose with a number twenty hose
clamp pull the hose from the rear of the
car until the splice is centered up in
the frame rail cut out repeat this
process on the other main hose put
Loctite in the upper radiator mount
holes and on the rubber isolated
radiator studs install the studs into
the radiator place the fan on the
backside of the radiator as shown
install the angled plastic brackets with
a square of foam tape under each one put
a spring on each plastic rod and stick
the rods through the plastic brackets
pull the rods through the radiator slot
a foam pad on each plastic rod followed
by plastic locking discs pull the rod
until the spring is mostly compressed
cut the excess plastic rods cut the ends
off of the radiator fan wires crimp 1/8
inch eyelet on the black wire crimp an
insulated disconnect terminal on the
other wire on the car
cut the black radiator fan wire and
crimp an insulated terminal clear excess
paint or powder coat out of the lower
radiator mount holes install the
radiator with the plastic radiator
adapters on the lower posts
put the rubber isolated studs through
the upper frame mounts and install m6
nuts and washers tighten with a ten
millimeter socket use a self-join screw
to attach the radiator fan ground to the
frame connect the radiator fan terminals
[Music]
install the front brake lines to the
brake t the shorter line goes to the
driver side tighten the tube nuts with a

10 millimeter wrench find the longer end
of the medium hose with two bins measure
and cut this in three and three quarters
back from the binned connect a hose to
the top of the radiator connect the
bottom of the hose to the driver side
main hose
[Music]
cut the shortest formed hose just before
the top Bend install this hose between
the bottom of the radiator and the
passenger side main hose lay the longer
the two fuel tank clamps out mark 12
inches and 22 inches from the end of the
clamp without the stud do the same with
a shorter clamp but Mark at 11 inches
and 21 inches bend the clamps at the
marks
mark the upper fuel tank rails six
inches from each end line the fuel tank
up between the marks and hold it in
place with a piece of tape leave the
tape a little loose cut four pieces of
leftover main coolant hose then cut the
pieces in half insert two rubber hose
pieces between the tank and the rails on
the driver side wrap the longer fuel
tank clamp around the tank
you
insert two more hose pieces between the
clamp and the tank tighten the clamp
[Music]
repeat this process on the passenger
side of the car
[Music]
[Music]
slip the filler neck hose over the fuel
tank neck drop to number 32 clamps on
the hose install the donor filler neck
into the hose and slide it behind the
frame mount use a t30 torx to install
the donor filler neck screws bin the
vent tube back and down as shown tighten

the clamp on each end of the hose
drilling 9/32 hole in the fuel filler
neck to install the fuel cap tether
[Music]
put Loctite on the barbed fuel tank vent
fitting and install it next to the
filler neck tube use a 7/16 wrench to
tighten the fitting in the next video
we'll install the powertrain into the
frame

E20
in part 20 of our build guide we install
the powertrain and DS blocker
before installing the powertrain install
the serpentine belt if you eliminated
the AC compressor by a replacement belt
for a cobalt without the AC this belt is
34 and a half inches long and has five
ribs and saw the vacuum line that you
cut earlier in the build use the coated
clamps and a donor bolt to hold it to
the intake manifold put a 5/16 vacuum
cap on the port above the throttle body
apply anti-seize to the threads inside
the powertrain mount tubes and to the
m14 bolts install the mount plate with
the supplied hardware compare the place
to your powertrain to figure out how to
orient them use a 22 millimeter socket
to run the mount bolts down but don't
tighten them yet do the same for the
passenger side but don't forget to
install the spacers under the plate find
the m10 bolts you removed from the front
and rear seats of the donor park the
powertrain behind the frame with a
furniture dolly at the front two people
can lift the frame over the powertrain
if you don't have a furniture dolly the
third person will need to carry the
front lower the frame down until the
mount plate wrist on the powertrain
[Music]
use the donor seat both to connect the
place to the powertrain
[Music]
use a 15 millimeter socket to torque the
bolts to 37 foot tails use a 22
millimeter socket to torque the larger
bolts to 100 foot pegs guide the main
harness between the filled tank and
powertrain
[Music]

lay the main harness close to the engine
leaving the area over the transmission
clear install the automatic transmission
cable between the tank and the
powertrain snap the cable into the metal
bracket and onto the shift arm place the
fuse box housing on top of the
transmission and install the yellowish
multi-plug make sure the starter cable
is routed under the fuse box use a donor
m6 bolt and nut to attach the fuse box
to the transmission mount plate use two
more donor bolts and nuts to attach
spangle fuse box mount and a coated
clamp to the frame
install the rest of the fusebox multi
plugs
slide the ECM and TCM into the two slots
housing connect to ECM and TCM plugs
make sure they are completely seated and
then flip the lever to lock them in
using this tab to attach the fuse box
wires to the fuse box housing connect a
large black and purple power plug to the
main harness remove the black fuse box
multi plug and remove its cover
by the large black wire that you use to
extend the radiator fan wire starter the
black wire to the large slot blue wires
coming out of the multi plug
[Music]
we install the black multi plug install
the fuse block on top of the fuse box
housing make sure the plastic Clips
around the outside lock in place use a
seven millimeter socket to tighten the
multi plug bolts connect the power
stringing wire at the rear of the fuse
block slip the starter cable over the
stud at the front of these blocks use a
ten millimeter socket to tighten a
positive post install the fuse box
covers pull the automatic shifter cable

into the tunnel from underneath the car
disconnect the starter wire and use a
thirteen millimeter socket to remove the
nut on the positive stud
[Music]
pull the main positive cable under the
fuel tank and aim it up towards the
starter then the end of the positive
cable and attach it to the starter stood
tighten the nut and reconnect the
starter wire pull the nylon vacuum line
up to the vacuum hose coming from the
intake set the line where it meets the
hose so the plate number six clamp on
the vacuum line insert the line into the
hose and tighten the hose clamp
use zip ties to bundle the wire harness
cables and vacuum line
loosen the brake T nut and install a
Kodi clamp around the large bundle cut
the driver side main hose three inches
from the frame rail insert a one and a
half inch splice into the hose and
tighten the clamp around it cut the long
formed hose 17 inches from one end and
four and a half inches from the other as
shown install the four inch end onto the
splice with a hose clamp mark and cut
the stock radiator hose where it meets
the forum post you just installed
connect the two hoses with a one and a
quarter splice
[Music]
connect a 17 inch long formed hose to
the passenger side lane hose install the
large hose with a 60-degree bin onto the
cylinder head water Nate cut the upper
end of the lower formed hose to match
the top hose connect the hose with a 1
in 1/4 spot use an 18 millimeter socket
to remove the front motor mount bolt and
saw the hose routing clamp to keep the
hose off of the alternator pulley torque

the boat to setting four foot pounds
before installing the fuel pump
carefully rotate the fuel lines to point
the opposite direction
[Music]
then install the fuel pump seal lower
the fuel pump down into the tank with
fuel lines pointing towards the driver's
side of the car slip the aluminum
retainer ring over the fuel lines and
onto the tank studs
install the quarter inch nuts and
washers use a 7/16 socket to tap the
nuts until the retainer is a quarter of
an inch from the tank use a quarter inch
drill bit or allen wrench to check the
distance
connect the fuel pump plug connect the
fuel filter to the fuel pump lines use a
donor m8 bolt and a nut to attach the
fuel filter to the fuse box housing as
shown use a self drilling screws and
coated clamp to hold the liners to the
fuse box above the fuel filter connect
the supplied fuel line to the fuel rail
used a donor m6 bolt and encoded clamp
to hold the line to the valve cover
route the line down behind the fuse box
and guide the end between the
transmission mount and the frame push
the steel line into the fuel filter
until it clicks use a coated clamp and a
donor m6 bolt and nut to hold the fuel
line to the fuse box housing lose the
plastic clip of the coolant tank over
the metal loop on the frame both the
tank to the frame with a donor m6 bolt
and nut
disconnect the TCM plugs connect a piece
of one-inch heater hose to the coolant
tank
reconnect the TCM plug cut the hose and
attach it to the water neck is shown

shut the overflow hose where it meets the overflow tank and install it with a clamp in the next video we'll crank up the engine for the first time

E21
in part 21 of our build guide we start the engine for the first time install a 5/16 vacuum cap on the radiator vent tube remove the radiator cap disconnect the passenger side hose from the cylinder head pour coolant into the hose while someone watches the level in the radiator install the radiator cap when the coolant reaches the top of the radiator then reconnect the passenger side hose pour coolant into the overflow reservoir keep pouring until the level is above the ridge in the tank unbolt the reservoir and lift it above the engine remove the cap and massage the coolant hoses to get the air out of the lines keep adding coolant and massaging the hoses until no more bubbles come out the system should hold about two gallons of coolant both the tank back to the frame and install the cap if your transmission is an automatic use a 10 millimeter socket to install the transmission fluid loop on the front of the transmission
[Music]
connect the automatic gear selector wires push the gear select table all the way in to put it in park manual cars need their transmission shift arms in the middle positions to be in neutral install the battery hold-down studs into the battery box put the battery in and slip the battery hold-down strap on the studs mark the studs one inch up from the hole down strap we use one inch wide tape to mark them remove the battery and studs trim the studs where you mark them reinstall the studs battery and hold down strap
use a half-inch socket to tighten the knowledge nuts until the hold down strap

is tight against the battery don't over
tighten them push the positive terminal
onto the post make sure it is all the
way down before tightening the nut with
a ten millimeter socket close the
plastic cover connect the BCM power wire
and zip tie it to the frame
[Music]
push the negative terminal onto the
negative post don't tighten it at this
time
uncover the throttle body and valve
cover vent turn the key to the run
position test the throttle pedal to see
if the butterfly reacts if the ignition
switch or throttle won't work go to our
forum for help pour in about an eighth
of a tank of fuel
remove the fuse box lid and the fuel
pump relay jump the fuel pump to promise
listen for the fuel pump to pick up fuel
disconnect the jumper and install the
relay in fuse box lid a bluetooth obd2
reader is very useful for reading
coolant temperature during the first
start you can buy one online for ten to
twenty dollars before starting it check
your oil level also temporarily install
the downpipe with the two catalytic
converters to keep the noise level down
make sure your area is well ventilated
and start the engine
hold the engine at 2,000 rpm to warm it
up if you still had air in your radiator
hoses the coolant overflow tank might
need to be topped up as the engine runs
and air is purged
in the next video we'll finish up the
first stage of the Goblin kit

E22
in part 22 of our built guides we finished assembling page one of the Goblin kit install the firewall at the back of the driver compartment Lane the firewall forward and apply silicone around the perimeter where we'll contact the frame and floor pan rivet the firewall to the frame
there are several rivets across the top sides and bottom rivet the bottom edge from the engine side of the firewall
lift the car and put it on jack stands put the jack stands within a couple of inches of the end of the frame rail if you place the jack stands too far forward the car could tear over backwards
listen subframe under the car pull the hoses out of the way to get the subframe up to the chassis
[Music]
both the subframe to the chassis with the supplied hardware patent and nuts by hand to hold the subframe of
[Music]
it start the control arm into the subframe and install the original front bolts with a 15 millimeter socket and stall the rear bolts with a 21 millimeter socket torque the front bolts to 41 foot-pounds toward the rear bolt to one hundred foot-pounds use a 15 16 socket to towards the front subframe nut to one hundred foot-pounds repeat this process on the other side of the car and remove the jack
using an 18 millimeter socket to install the front transmission both towards the bolt is tending for foot-pounds use a 15 millimeter socket to install the three rear transmission mount bolts torque them to 44 foot-pounds install the

ambient temperature sensor into one of the holes in the old radiator mounting bracket at this point Stage one is complete in the next video we'll prepare the stage two parts

E23
in part 23 of our bill guide we assemble
the front suspension install the 3/4 16
Jam nuts onto the for larger audience
run the jam nuts all the way down repeat
this process for the 8 small rod ends
install a large rod end into each
control arm start by running the rod in
all the way in until the jam nut bottoms
out then run the rod end back out for
full turns
make sure the rod end is parallel to the
control arm when you finish run the jam
nut in to keep the rod in from turning
repeat this process for the smaller
audience run the rod end all the way in
before turning it back out for full
turns the smaller audience should be
perpendicular to the control arm do the
same for the rest of the smaller
audience
slip a piece of radiator hose over the
lower frame rail to protect it install
the lower control arm the single beam
goes forward and the shock mount goes
downward and stop bolts and washers from
the front of the car through the smaller
audience and chassis
don't forget the washers under the hinge
of the bolts
install the nuts use 3/4 inch tools to
torque the hardware to 90 foot-pounds
repeat the process for the upper control
arms install one snap ring into each end
of the coilovers
cap the shock bearings in with a socket
and small hammer install the remaining
snap rings install the spring seat jamb
nut with the shoulder aimed up do the
same with the spring seat apply
anti-seize to the threads about two
inches up from the bottom run the jamb
nut and spring seat down about one and

three-quarter inches from the bottom
install the spring seat washer slip the
spring over the body of the shock
install the spring cap by sleeping it
between the screen and the upper shock
end adjust the spring seat in Jam nut
until the spring has no slack repeat the
process for the other coil over
install the upper shock Milt a small
hammer might be necessary slip a spacer
the upper shock in any nut onto the
shock bolt install the lower shock bolt
with two spacers the lower shock end any
nut use 3/4 inch tools to torque the
shock hardware to 30 foot pounds
slippy riding mount to safety washers
any nut onto the large rotten bolts make
sure the round corners of the rotten
mounts go away from the head of the boat
also the small faces of the safety
washers should be against each other
place the uprights as shown the narrow
bolt hole pattern should be away from
you
install the upper rotten mounts as shown
the offset should be aimed toward the
upright install the bolts and washers as
shown
flip the uprights keep the upper rotten
mounds away from you install the upper
washers and nuts install the lower
rotten mounts as shown just like the
upper mounts the opposite should go
toward the upright install the washers
and nuts
run the nuts down with 9/16 inch tools
then torque to 33 foot-pounds inserting
tie rod end into one of the steering
arms make sure the taper is in the right
direction to let the arm go all the way
onto the tie rod end install the
steering arm as shown the arm should go
away from the brake caliper ears and the

tie rod Ian should be below the steering arm install the washers and bolts repeat for the other steering arm
flip the uprights and install the nuts and washers
use nine 16-inch tools to run down the nuts then torque to 33 foot-pounds
remove the nut in one safety washer from the lower rotten boat insert the boat into the lower rowdy end and reinstall the safety washer and nut repeat for the upper rotten boat remember to aim the small face of each safety washer toward the rotten ball install the tie rod end into the steering arm
use 15 16 inch tools to torque the large rod in hardware to one hundred foot-pounds use a 17 millimeter socket to torque the rod in net to 50 foot-pounds install the bearing hub from the rear of your donor into the front upright it isn't shown in the video but you should use a 15 millimeter socket to torque the nuts to 50 foot-pounds use an inch and 1/8 wrench to jam the large rod in nuts use a 3/4 wrench to jam the small rod in nuts
in the next video we'll install the front brakes

E24
in part 24 of our build guide we install the front brakes before installing the front calipers you want to disassemble clean and paint all four calipers start by using an 11 millimeter socket to remove the brake line banjo bolt be sure to save the bolt and washer for later examine the brake hose for cracks or other damage if your brake hoses in bad shape you'll need to replace it with a new hose use a 10 millimeter socket to remove the brake bleeder valve clean up the brake fluid as you go keep in mind that brake fluid can damage painted surfaces use a fourteen millimeter socket to remove the caliper guide pin bolts then separate the bracket and caliper remove the brake pad retainers and save them for later slide the caliper guide pins out of the bracket remove the guide pin boots
use a screwdriver to push the piston out of the caliper check the piston for pits or other damage gently remove the dust boot
don't let it snag or tear on the ends of the retaining ring
[Music]
inspect the boots for damage
use a small screwdriver to remove the retaining ring use the screwdriver again to gently remove the seal
inspect the seal for damage
[Music]
soak the caliper brackets and cleaners such as super clean
[Music]
after soaking for some time spray more cleaner on the bracket and scrub their bracket clean we like to scrub with a wire brush you'll most likely have to repeat this process a few times to get

the bracket clean do the same with the calipers you'll also want to clean the mantle bolts washers and other Hardware removed earlier before painting the calipers you'll want to amass certain areas to keep paint out start by taping the Pistons as shown
slide the piston into the caliper to keep the pain out of the cylinder cut four pieces of 3/8 hose to cover the banjo bolts the pieces should be about a half inch long slip the hose over the banjo bolts
install the banjo bolt until the rubber is seated against the caliper then tape the head of the banjo bolt install the brake bleeder valve and cover it with tape
[Music]
clean the grease out of the top edge of the guide pin holes then push tape into the holes to keep paint out paint the calipers with high temp brake caliper paint follow the directions on the can for best results
once the paint is dry install the guide pin boots into the bracket make sure they go all the way in
[Music]
applied brake lubricant to the guide pins before installing them
notice that the guide pen with a black rubber tip goes in the hole closest to the direction stamp thread the guide pin bolts part of the way into the guide pins lubricate the caliper seal with brake fluid be very careful with brake fluid near the freshly painted calipers wipe your fingers as you go to keep from messing up the paint
insert the caliper seal in the groove at the top of the cylinder once installed lubricate the seal with more brake fluid

with the outside of the piston with
brake fluid to make it easier to install
insert the piston about halfway into the
cylinder
slip the dust boot over the piston
very gently push the boot down into the
cylinder groove you'll have to work your
way around the boot to get it all the
way into the groove
[Music]
install the retaining ring as shown
work your way all the way around until
the ring is pushed all the way down into
the dust boot
push the piston all the way into the
caliper install the banjo bolt and two
washers install the bleeder valve
if your car has four lug front rotors
install the rotor centering rings before
the rotors slip the rotor on and run two
lug nuts down to hold it in place until
the caliper is installed install the
brake caliper bracket with the bolts and
spacers supplied with your kit use a 15
millimeter socket to torque the bracket
bolts to 85 foot-pounds install the
brake pad retainers
install the brake pads
remove the guide pin bolts and use them
to install the brake caliper the bleeder
should be aimed up
use a 14 millimeter socket to torque the
guide pin bolts to 25 foot-pounds
install the outer brake hose supplied
with your kit put one washer on each
side of the brake hose fitting use a 14
millimeter socket to torque the banjo
bolt 235 foot-pounds connect your donor
car's rear brake hose to the goblins
inner brake line
[Music]
use a small hammer to tap the donor
brake hose clip into place use a 10

millimeter wrench to tighten the brake line nut connect the control arm brake line to the outer brake hose as shown use a 5/8 wrench to hold the hose while tightening the brake line nut with a 10 millimeter wrench
[Music]
connect the other end of the brake line to the inner brake hose the brake line should match the shape of the control arm tighten the brake line nut with their same wrenches as before attach the brake hose clamps as shown the one-inch coated clamp goes to the control arm and the three-quarter inch clamp goes on the brake hose use a 5/32 allen wrench to thread the bolt down through the clamps install the quarter 20 nut and tighten with a 7/16 wrench
repeat this process for the inner brake hose clamps
turn right and left through the full travel to make sure the hose doesn't bind or pull too tight
in the next video we'll install the brake reservoir relocation kit

W1
I know the wiring harness looks intimidating but reworking it for your Goblin is not difficult the work is tedious but by following our videos you'll have no trouble finishing it you can try doing the work on your kitchen table but to follow our videos that make your life easier it's a good idea to build a 4 by 8 table like ours we use 42 inch tall sawhorses
with 96 inch top boards the sawhorses are topped with a 4x8 sheet of OSB and a thin sheet of plywood grab a 24 inch long tube before and market one inch and 13 inches from one end attach this board under the table 12 inches from the corner when you attach it line up the 13 inch mark with the edge of the table the one inch mark should be away from the table plug the fuse box housing with the one inch mark and mount the box with a screw and washer use another screw washer to hold a fuse box from the side on the other end of the table mark the harness split point it is nine inches from the end of the table and five inches from the side
[Music]
make another mark 9 inches from the end of the other side of the table and draw a line between the marks
[Music]
use the graphic on the right to lay out the - honest breakpoints these labels will be used later to organize the - harness
once the table is finished it's time to move on to stripping the main harness lay the main harness on the Fulbright table like you see me doing the engine portion of the main harness should be near the fuse box housing and the wrist

should wrap around the table try to
organize it like ideas so that it is
easy to follow which part of the harness
not working on the whole harness won't
fit on the table but that's fine just
let it hang over the edge of the table
we're going to have to remove mini wires
from the harness and make some
modifications so the whole harness needs
to be unwrapped start by using wire
cutters to snip all of the plastic wire
ties
[Music]
makes use a sharp knife to remove the
tape and plastic wire loom when removing
the plastic loom cut the tape along the
split in the loom and then peel the loom
off of the wires none of the plastic
loom on the main harness will be reused
so it's alright if it gets damaged
anytime you're cutting the tape try to
keep the knife moving the same direction
as the wires so that you aren't slicing
across them as long as you're careful
with the knife you'll find that the tape
cuts easily and the wires are unharmed
peel the rubber boot off the firewall
pass-through structure and snip through
the plastic to remove it from the
harness
you should not have to cut the tape and
rubber boot around the harness the
rubber boot is tough to cut so slice it
in small bites keep cutting until you
can pull the boot from the harness
continue through the rest of the harness
removing tape and loom as you go you can
get the tape off the harness by wrapping
it but I find it easier to slice the
tape down the length of the wire and
then peel the tape off in small pieces
as you're working try to maintain the
shape of the harness the wires will hold

their shape pretty well as long as you
don't move the harness around it's not
looking less intimidating yet but in the
next video we'll start removing
unnecessary wires and it'll start
looking much more manageable subscribe
to our Channel and click the bell icon
to get notified when our new videos go
love if you have any questions send us
an email give us a call or join the
forum thanks for watching

W2
the next step for wiring the harness is to remove all the wires that won't be used in the Goblin this includes things like the abs and airbags some of the large multi plugs have caps that will get in the way while thinning the harness before removing the caps put a single mark across the cap and plug to mark the orientation of the cap gently prop the plastic retaining clips to remove the caps
cut the zip tie on the blue BCM connector and then use your knife to pry the cap off as shown the intercooler water pump we supply for turbo cars requires a circuit that comes on with the key the pink wire at position B - on the gray multi plug is a good wire for the water pump trace the pink wire through the harness and cut it near the electronic brake control connector pull the wire free from the harness and tie knot to identify it later turbo and supercharged goblins also require Keyon power for the heat exchanger fan we use one of the pink wires at position D 7 on the red BCM multi-plug trace little wires back to the passenger seat connector cut the wire here and tie a knot pull the wire free of the harness but do not cut it out now it's time to start removing the connectors and wires that won't be used in the Goblin first up is the electronic brake control connector start by cutting the twisted tan and brown wires near the electronic brake control connector leave the wires attached to the ECM connector and move it out of the way next cut the vacuum sensor connector from the brake control connector do not throw away any wires or connectors at this time instead store

them in a cardboard box in case you make a mistake
cut the thick ground wire from the brake control connector roll the wire up and save it for later one by one cut and remove the remaining twisted pairs of wires from the brake control connector some wires will go to the wheel speed connectors which can be removed entirely other wires will go to larger connectors in this case cut the twisted wires and toss them in your box repeat this process until the electronic brake control connector is no longer attached to the main harness
near the fuse box housing you will find the windshield wiper connector this connector and all of its wires can be removed when you trace the wires you'll find that three go to a white fuse block multi plug all three of these wires can be cut near that multi plug the remaining yellow wire can be cut at the wiper connector and then trace to one of the two BCM connectors cut the yellow wire near the BCM connector and toss the wire into your box close to where you found the wiper connector you will find another black connector as shown the only wires we need here are the ambient temperature sensor wires these wires are green with a white strap and yellow with a black strap cut the wires and tie them in a knot
the twisted pair wires are for the collision sensor you might also have wires for a hood a jar sensor cut these wires from the connector then thin them from the harness next up are the door plugs first cut both wires of the driver door ajar sensor the black ground wire will come out later but go ahead and trace the other wire and cut it near one

of the BCM connectors after that find
the driver door connector and cut the
thick light blue wire trace the wire to
the passion of your door plug and cut it
out roll this wire up and save it for
later one by one cut and remove the rest
of the door connector wires you'll
notice that two gray with black stripe
wires go to a tape union the wires at
this union will all be removed as shown
one of the gray wires will go to the red
BCM multi-plug the last wire will go to
the passenger door connector continue to
cut trace and remove the driver door
connector wires
find a large yellow airbag system
connector all of these wires will need
to be removed two of the wires will go
to the driver's seat connector cut the
pink wire first and trace it to the tape
union the Union and pink wires will all
be removed as shown
the tan waar will lead to the large
yellow connector cut the wire to remove
the driver's seat connector from the
harness continue cutting the wires of
the large yellow connector you'll find
many twisted pairs of wires that lead to
small yellow connectors cut each pair of
twisted wires to remove the connectors
continue cutting and tracing wires until
the large yellow connector is free from
the harness in the same location as the
large yellow connector you will find a
small black connector this is the
parking brake switch connector with ABS
removed this switch will no longer work
and should be removed if your car has a
yawl sensor you can remove the connector
and wires from that system now it's time
to remove the passenger seat connector
your C connector might have an extra
connector attached to it just drop that

connector over the edge of the table and work on the C connector cut the wires attaching the C connector to the main harness and remove those wires
next we'll remove the body - - wires first up is the antenna wire this should pull right out of the harness without cutting anything the body - - connector is removed next one-by-one cut the wires near the connector trace them through the harness and cut them out
we've already removed a few passenger door wires work through the remaining wires until the connector is free from the harness
you do not need to thin out the black ground wire just cut it from the connector and leave it on the table
cut the passenger door ajar wires and remove the hand wire you can leave the black wire for now as you can see the harness is looking much thinner and less intimidating already in part two we will finish thinning the harness subscribe to our Channel and click the bell icon to get notified when our new videos go live
if you have any questions send us an email give us a call or join our forum
thanks for watching

W3
in this video we'll finish thinning out
the main harness wires that won't be
used in the Goblin you might have
already cut the fuel pump wires during
the donor stripping process if not cut
the large gray small tan and purple
wires now tie these three wires in a
knot to mark them and pull them through
the harness break them over the fuse box
to be used later
next cut the large black fuel pump
ground and set it aside
remove the rest of the fuel system wires
by tracing them through the harness and
cutting them out
if your donor had an XM radio you can
cut that connector out cut the wires one
at a time and remove them from the
harness you can leave the black ground
wire behind next find the passenger
taillight connector you'll reuse these
wires in your Goblin but you do not need
the connector one at a time cut the
wires near the taillight connector and
pull them through the harness do not cut
any of these wires on the other end
leave them attached to the harness you
can leave the black wire where it is it
will be dealt with later remove the side
marker light connector but do not remove
the wires pull the brown wire back to
the tape union and leave the black wire
alone one at a time cut and trace the
headliner wires to remove them
a few of the wires will go to to nearby
white connectors these wires can be left
alone because these connectors will all
come out together the bigger white
connector is a VCI M connector cut and
remove the wires that go from this
connector to the main harness one of the
VCI M wires will go to the trunk light

connector cut this wire to remove the
headliner and white connectors on the
remaining trunk light wire you'll find a
large section wrapped in tape this is
the trunk release node trace the wire
pass the diode until you get to a small
tape Union cut the wire at this union
next find the trunk release connector
remove the connector and thin out all of
these wires except for the black ground
find the subwoofer connector trace the
wires through the main harness as shown
cut the wires at the large body - -
connector and discard the whole bundle
the black DCIM connector can be removed
next cut in thin out all of the wires of
this connector
find the rear window defroster connector
you do not need to cut near the
connector just work the wire through the
harness and cut it near the large gray
multi blood next is a driver tell that
connector you won't need to keep this
connector but you will need the wires
cut the wires near the taillight
connector and pull them through the
harness but do not cut the other end you
can leave the black ground wire where it
is repeat the process for the side
marker light and license plate light
pull the brown wires through the harness
and leave the black wires alone next
find the backup lamp connectors they
will be identical connectors with green
and black wires cut the backup lamp
wires at the connectors and trace the
green wires to the small tape union cut
on the other side of the tape union to
remove the backup lamp wires pull the
single green wire through the harness
but do not cut it out leave the black
wires where they are both of the rear
speaker wires should be removed next cut

the wires near the connector and remove them from the harness
the center have mounted stoplight connector should be treated like to tell that connectors remove the connector and trace the blue wire through the harness but do not remove the wire find one of the copper lugs that is no longer connected to the main harness untangle all of the ground wires attached to this look and roll it up to be used later repeat this process for the other copper ground load these two ground lugs are the only two that need to be rolled up find and trace the large red power wire back to the red BCL multi-plug measure 12 inches back from the multi plug and cut the red wire on the other end of the red wire cut 16 inches from the 50 amp fuse save the 50 amp fuse section roll up the long red wire and save it for later at this point the main harness is completely thinned out in the next video we'll start to organize the main harness to fit to goblin subscribe to our Channel and click the bell icon to get notified when our new videos go live if you have any questions send us an email give us a call or join our forum thanks for watching
you

W4
in this video we'll start organizing the
main harness to fit the Goblin first up
is the ECM connector tape a little over
a foot of the wires leading to this
connector you should have about six
inches of twisted tan wire exposed past
the tape install the ECM into the fuse
box housing and connect the ECM
connector next is the large gray fuse
box multi-plug hold the cap on the plug
to see which direction the wire should
exit the plug take about one foot of the
wires of this plug
put the cap on the multi-plug and snap
the multi-plug into the fuse box housing
as shown the brake fluid reservoir will
be closer to the BCM in the Goblin than
it was in the cobalt this means the pink
reservoir will be shortened for now just
cut the wire and tie both the ends into
a knot pull about two feet of the black
wire and cut it as shown save the brake
fluid reservoir connector for later
trace the pink wire to the BCM connector
and leave it over the edge of the table
work the medium-sized gray multi plug
through the harness to the BCM connector
find the ambient temperature sensor
why're you tied in a knot while thinning
the harness pull the wires back to the
VCM connector pull out a few feet of the
black wire on the coolant level
connector cut the wire and tied in a
knot
wertha connector and wires through the
harness to the BCAM connector
cut both wires of the accessory power
connector remove the red and white wire
from the harness hold the cap of the
dark gray multi plug in place to see
which way the wire should aim type up
about a foot of these wires

install the cap and snap the plug into
the fuse box housing
next tape up about eight inches of the
body - engine harness connector
group the wires near the fuse box
housing has shown the light blue wire
should aim the opposite direction of the
other wires hold the body to engine
harness connector next to the fuse box
wires and take the wires together the
shape of your harness should match ours
tuck the loose wires into the fuse box
housing to keep them out of the way grab
one of the copper lugs and start pulling
the loose wires free from the harness
any wires that are still attached to
connectors and the harness to be cut as
shown tie knot to mark the wires roll up
the ground wires and save them for later
repeat this process for the other copper
ground load
next we'll start working on the large
body - - harness many of the wires were
cut while the harness was being thinned
go ahead and trim all these wires close
to the connector to get them out of the
way next we'll label the wires that need
to remain in the harness check in the
video description for links to documents
that will list the wire and pin
information so you can make your own
labels one at a time find the wire that
matches each label and securely stick
the label to the wire
one wire will have a tape Union pull the
loose wire from this tape Union cut it
out and discard it mark the other wire
with the label continue until the column
of labels are all applied
there will be wires left over that did
not get labeled these wires won't be
used in a goblin cut them near the
connector and thin them from the harness

[Music]
now you can cut the labeled wires to remove the large connector do not remove the wires from the harness
carefully untangle the label wires from the harness and set them aside they will be extended later on
a few feet from the fuse box housing pull the slack out of each wire as shown we're trying to pull each wire so that they are the same length from the fuse box housing to where we are holding them
once you have all the wires tight tape them together grab the loose wires from the fuse box housing and set the blue and green wires aside as shown the other wire should be pulled to the thick bundle of wires group the wires and tape the bundle together
much the excess loop of wash together and take them to the main bundle at this point the harness is already looking more organized you should have a group of wires that need to be extended two wires that will be used for the fuel pump a pink wire for the coolant level a twisted pair of data wires and the loose blue and green wires subscribe to our channel and click the bell icon to get notified when our new videos go love if you have any questions send us an email give us a call or join our forum thanks for watching

W5
in this video we'll continue organizing the main harness to fit the Goblin tape up a few inches of the white DCM connector before zip tying the wires to the connector
continue typing about one foot of the wires install the blue cap and fasten it in place with another zip tie
trim the short unused wires of the red BCM multi-plug
group the remaining wires as shown taped the wires until you are a few inches from the end of the large red and black wire
attach the red multi-plug to the BCM using a seven millimeter nut driver or socket connect the white and blue connector as shown take the two bundles of wires together near where the large red and black wire is exposed pull the BCM to the tables edge and attach it with two drywall screws be sure to pull all the wires tight as shown
the wire should be near the harness split point that you marked when preparing the table in the first video
find the brown junction near the BCM fold the tape union over as shown the loose wires pointing toward the BCM should be left where they are for now and the other loose Brown wires will hit toward the fuse box pull the slack away from the BCM and take the wires near the brown wire junction
move about one and a half feet toward the fuse box housing pull the wires tight and tape here double over the loops of wires is shown to condense the bundle
take the harness in a few spots to hold the wires in place
pull the brown wires on the left side

all the way to the fuse box housing pull
the other brown wires to the BCM grab
the yellow and green wires near the BCM
and take them to the fuse box housing
Nick's take the light gray multi plug
from the BCM to the fuse box housing
tape up a little over a foot of the
multi plugs wires install the black cap
and tape it in place
snap the multi plug into the fuse box
housing find the headlight harness and
Mark the multi plug as shown remove the
cap and unwrap the whole harness
next remove the windshield washer
connector and the orange wire
the cobalt uses a long length of wire to
control the daytime running lights you
don't have to remove this wire unless it
is burnt up if it is in bad shape cut
both ends of the wire near the multi
plug and then solder the short leftover
wires together
find the headlight plug closest to the
multi plug cut the black wire about two
inches from the connector leave the
otherwise alone repeat the process for
the horn connector but leave about six
inches of the black wire this time find
the ground lug near the multi plug type
up one foot of the ground wires start
taping the headlight harness wires at
the multi plug continue to wrap up to
where the ground wires meet the harness
fold the tape ground wires back as shown
and continue typing the harness for a
few more inches go into the shortest
ground wire still has about five inches
exposed trim the longer ground wires to
the same length as the shortest wire
strip the end of all the ground wires
solder 48-inch extension wires to these
ground wires
continue taping the headlight harness

and ground wires until you get within 10 inches of the headlight plug
reinstall the multi plug cap and snap the plug into the fuse box housing route the harness under the fuse box housing and tape it to the main bundle of wires
grab the coolant tank connector near the BCM tape about one foot of the coolant tank wires
find your fuel pump harness and cut the fuel pump wires near the main connector
pull the plastic loom off of the fuel pump wires and remove the small pieces of old electrical tape the leftover connectors are large are for the evap system
wrap about a foot of these wires
next grab your ambient temperature sensor harness unplug the temp sensor and set it aside
cut the ambient temp sensor wires near the black connector take the foot and a half of the ambient temp sensor wires
grab the coolant tank connector and the fuel pump connector place these connectors beside the temp sensor wires as shown the temp sensor wires should stick out past the other connectors as shown tape all of these wires together for about eight inches hold this group of wires next to the main bundle near the fuse box housing take them all together as shown in the next video we'll continue organizing the main harness subscribe to our channel and click the bill akhon to get notified when our new videos go live if you have any questions send us an email give us a call or join our forum thanks for watching

W6
in this video we'll continue organizing
the main harness to fit the Goblin
separate the fuel pump wires from the
rest of the harness this includes a
thick grey wire a purple wire and a tan
wire if your donor was a turbocharged SS
then you will have labeled the tan wire
earlier it will say v6 clutch and fuel
level for other donors none of the wires
will be labeled pull one ground wire
from the group of wires you extended in
the previous video this will be used for
the intercooler water pump if your donor
had abs grab the leftover ABS ground lug
otherwise pick up one of the leftover
ground lugs with a fewest number of
wires tape the ground wire as shown with
about 18 inches free on the fuse box
into the wire match up the long gray
wire with a short gray wire coming from
the fuel pump harness cut them to the
same length and solder them together as
shown
repeat the process with the long purple
wire and the purple wire coming from the
fuel pump harness
[Music]
collect the ground leg wire the fuel
pump ground the coolant tank ground and
the fuse box ground solder all of these
wires together as shown next grab the
long tan wire and the tan wire from the
fuel pump harness if your donor was not
turbocharged just cut the wires and
solder them together like the gray and
purple wires if your donor was a
turbocharged SS you will add a 10-foot
long clutch extension wire before
soldering them together mark the
extension with the extension wire b6
label pull the extension wire to the BCM
match the ambient temperature sensor

wires from the BCM to the wires of the temperature sensor harness near the fuse box cut the wires with a little bit of overlap and then solder the wires together as shown
grab a left over a pair of twisted wires to extend the data wires the wires have to be twisted to prevent interference match the colors and solder the extension wires
pull the extension to the BCM grab the large light blue wire you saved while thinning the harness this will be your radiator fan wire tape it in place as shown and pull it to the BCM if you are building a turbocharged SS car you will now need to extend the wire used for the intercooler water pump solder a short red extension wire as shown
unwrap your electric power steering harness
cut about 12 inches from the light gray EPS connector set the longer section aside for now use the leftover big red wire to extend the EPS connector wire because these wires are so large it is helpful to use a copper crimp sleeve as shown we use two pieces of heat shrink over the joint pull the EPS connector about six inches past the fuse box and tape the wire in place next pull the ground wire extensions up through the harness and group them with the wires draped over the fuse box housing take the wash together as shown separate the light green wire and cut a few inches from where you taped double over the wiring cut it in half these wires will be your left and right backup light wires solder both wires back to your wire in the harness
take the bundle of wash together again where the light green wires are joined

now separate one of the light green wires a brown wire a yellow wire any black wire these wires will go to your left taillight pull the wires together and cut them at the end of the black wire to make them all the same length tape of these wires as shown repeat the process with the last light green wire the dark green wire a black wire and a brown wire these will go to your rod taillight
[Music]
then do the same with the last brown and black wires these will be the license plate la wires the light blue wire was originally for the center brake light you will need this wire to enable cruise control on late-model donors tape up the area where the tail light wires join they continue taping the harness as shown you will need to pop the multi plugs out of the fuse box housing to give yourself room to tape when you remove the multi plugs try to maintain the shape of the harness
tape until you're about six inches past the fuse box housing and then snap the multi plugs back into the fuse box housing roll up the taillight wires and zip tie them to the harness in the next video we'll finish organizing the main harness and be ready to bring in the dash harness subscribe to our Channel and click the bell icon to get notified when our new videos go live if you have any questions send us an email give us a call or join the forum thanks for Watching

W7
in this video we'll organize the main harness to fit the Goblin cut the large light blue radiator fan about six inches from the taped up wires crimp an insulated connector on the wire install the other half of the connector at this time you will finish wiring this connection while building your goblin grab 14-foot extension wires that are brown white yellow and green tape one into these wires and pull this into the BCM this will be your left-hand headlight and turn signal wires on the other end slide on the heat shrink and strip each wire take the wires to the fuse box and cut the headlight plug from the harness twist the headlight and extension wires together the blue headlight wire goes to the green extension brown to brown yellow to yellow and the dark green headlight wire goes to the white extension wire solder the wires and apply the heat shrink
[Music]
repeat the process for the other headlight plug with 10 foot extensions tape the extension wires in two places this will help you identify these wires as your right hand side wires later the dark blue headlight wire will again go to the green extension brown to brown the tan headlight wire goes to the yellow extension wire and the like green headlight wire goes to the white extension wire pull the wires to the BCM if your donor had fog lamps you will have purple wires in two places that can be used to power accessories extend the first purple wire toward the BCM the other purple wires near the fuse box heat-shrink the end of the wire rolled it up and zip tied in place cut the

greenhorn wire near the fuse box solder
a 9-foot extension wire here
sar to the other end of the extension
bar back to the connector
pull the connector to the BCM start
typing near the fuse box disconnect the
ECM plug to make taping easier tape
around the ECM wash fuel pump harness
and other wires that are already taped
those wires should remain sticking out
of the harness the wire chute labeled
earlier will get grouped and taped with
the main bundle keep taping until you
get to the end of the folded over wires
if you're working with a turbocharged
harness type up the read intercooler
pump wire with the last of the extended
black ground wires take the intercooler
pump wires to the harness as shown
reconnect the ECM plug son of the RIT
fused wires to the red and black wire
coming out of the BCM since these wires
are large we like to use a crimp sleeve
like we did in the previous video
at this point we are ready to start
stripping the dash harness before
merging it with a main harness subscribe
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to get notified when our new videos go
live if you have any questions send us
an email give us a call or join our
forum thanks for watching

W8
in this video we'll strip and thin the -
on us strip the tape plastic clips in
wire loom from the - harness
cut off the AC blower motor connector
and thin out the large brown wire
then out all of the wires of the
passenger-side - - body harness
connector
none of these wires will remain in the -
harness
[Music]
pull the antenna wire from the dash
harness
measure 20 inches from the ground log is
shown cut here and save the ground mug
for later
cut out the red wire of the accessory
power connector the black wire is no
longer attached to the harness so just
pull the connector out cut and remove
all of the wires of the passenger airbag
warning light connector
cut out the climate control system
connector
cut out the first amplifier connector
cut out the first stereo connector
remove the two copper ground lugs
cut out the traction control connector
the gray bar will be cut at a take Union
cut the white hazard wire and tied in a
knot pull it through the harness but do
not cut it out the gray bar will be cut
at a take Union then remove the
connector from the harness set the
ambient light sensor connector off to
the side do the same with the gauge
panel connector pull the airbag harness
from the dash harness cut out the second
stereo connector
turn out the windshield wiper switch
connector
pull the black fog lamp wire out of the

harness the gray bar will be cut at a
take Union cut the orange wire and tied
in a knot pull the wire through the
harness but do not cut it out cut out
the trunk release connector
[Music]
cut both wires of the dimmer switch
connector trace them to the BCM
connector cut the wires a few inches
from the connector and tie them together
cut the thick red and white wire of the
second amplifier connector pull the wire
through the harness but do not cut it
out cut out the rest of the amplifier
wires and remove the connector
next up is the steering wheel button
connector some of these wires will need
to be saved
keep in mind that some cars will have
less wires depending on the year model
and trim the first wire to save is a
pink wire cut the wire tied in a knot
and pull it through the harness the next
wire to save is a gray wire right next
to the pink wire the wire should trace
back to the BCM connector as shown the
next gray wire can be removed completely
it should trace back to the large BCM
multi-plug any remaining wires should be
saved except for the black wire
when you get down to the black wire the
connector should be free from the
harness cut out the steering angle
sensor connector
find the low-speed data wire splice back
cut the short wire that goes through the
OBD port tied in a knot do the same with
all the remaining wires except for the
wire that goes to the large driver side
- the body harness connector this wire
should be removed completely with the -
harnessed in doubt it's now time to
combine it with the main harness

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W9
in this video we'll organize the -
harness to fit the Goblin trim the short
left over wires in the large light
Granby CM multi-plug
tape about one foot of the BCM wires as
shown find a smaller light gray BCM
connector untie the purple and green
dimmer switch wires tsar these two wires
together and cover them with heat shrink
then tape a few inches of the BCM
connector wires before zip tying the
wires to the connector as shown
install the blue cap and use another zip
tie to secure it in place
[Music]
continue taping about a foot of the
wires
[Music]
temporarily disconnect the BCM from the
table and saw the large multi-plug with
a seven millimeter nut driver or socket
make sure the wires are aimed as shown
install the BCM connector and match it
in place pull the connector wires to the
multi plug wires and tape them together
then collect the other BCM wires and
tape them all together pull the bundle
of wires taut so there is an extra slack
near the BCM
they have to be see them and move the
main harness wires to the left as shown
install the screw at the harness split
point marked on the table in the first
video next we'll remove the - - main
harness connector start by cutting out
the short leftover wires one by one
place labels on each wire using a same
label sheet from the fourth video if
your donor had the performance display
option you will not find a boost larger
label instead you will find a pair of
twisted data wires running between the

display connector and the main connector
cut the twisted wires near the main
connector continue labeling the wires
before cutting the connector out
in the - wires you just cut you'll find
the accelerator pedal connector set it
aside for now do the same for the clutch
pedal connector keep in mind your donor
may have different clutch pedal
connectors there are several loose wires
that you tied in a knot earlier
depending on which donor you have this
can include the fog light hazard cruise
control and Keyon power supply wires
pull these wires to the BCM
next find the first turn signal switch
connector pull this bundle of wires to
the BCM do the same for the second turn
signal switch connector find the brake
pedal connector cut these wires and type
both ends as shown set the connector
aside and pull the loose wires to the
BCM pull the key fob and the TPMS sensor
wires to the BCM do the same with the
ambient light sensor wires SS donors
will either have your performance
display connector like this one or a
smaller boost gauge connector set the
connector aside as shown find the bright
green ignition switch connector tape
about 8 inches of these wires then find
the small black anti-theft connector and
tape it up the same way well line the
connectors and start taping them
together about 6 inches from the ends
continue taping for about a foot plug
the green connector into the ignition
switch and hang the switch over the edge
of the table pull the short loose -
wires to the side as shown pull the dash
harness tight and tape it in one place
to hold it together lift the ignition
switch until the green plug is eight

inches below the table find the black
and white wire and pull it tight
this wire should hold the ignition
switch in place
fine wires with slack and then loop them
to take up the slack it's easiest to do
this a few wires at a time taping them
as you go
you
grab the gray instrument cluster
connector and pull the wires toward the
BCM type up about seven inches of these
wires
next tape about five inches of the
power-steering data wires
do the same for the power steering power
wires align the power steering
connectors and tape both sets of wires
together tape about 15 inches of these
wires tape the obd2 wires up to where
they meet the power steering wires take
a few inches pass this Junction I'll
line these wires with the EPS mark on
your table and tape them to the dash
harness
do the same with the instrument cluster
wires now it's a good time to organize
some of the loose wires the boost gauge
or display wires can be pulled toward
the ignition switch the short wires can
be pulled away from the harness as shown
and excess loops of wires can be folded
over the power string power wires can be
pulled toward the BCM tape up about one
foot of the boost gauge wires pull the
connector toward the ignition switch and
tape up the wires where they meet the
rest of the harness in the next video
we'll start to combine the harnesses by
adding extension wires subscribe to our
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notified when our new videos go live if
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W10
in this video we'll start to combine the main and - harnesses
first you'll solder the - and main harness data wires together this donor had the RPD options so the data wires join at the - harness with all other donors these wires will join at the main harness match tan to tan and tan with a black stripe with tan with the black strap extend the brown with a watch strap wire with a 10-foot extension pull the wire around the screw near the BCM and then alongside the main harness match it with a brown with a watch strap wire coming from the fuse box housing solder these wires together repeat this process for the red and white strap wire this is the obd2 power wire
cut the - EPS power wire as shown find the large red and black wire in the main harness use a crimp sleeve to solder these wires together
[Music]
pull the green wire from the group of drivers side headlight wires lay the wire alongside the - honest grab - orange and 2 red 4 foot extension wires place the wires as shown and tape them near the EPS mark on the table
pull one orange one red and the green wire together these colors will match our mirror turn signals take the wires up to where they meet the - on us
trim the wires flush to each other find two brown wires in the main harness and pull them to the - honest Sardar these wires to the red turn signal wires
grab the loose wires that were tied in knots from this group pull out the gray tan white pink and orange wires these are the button paddle wires pull these wires alongside the dash harness at the

green with the watch strap wire to the button wires if you have an early-model donor you'll find a pink wire with the green and white wire tie these two wires in a knot to mark them for later
grab a three-foot black extension wire and add it to the group pull this group out and tape it back to where the - - stop taping near the cluster mark find the headlight wires again and this time pull the green wire from the bundle mark with two pieces of tape group the green wire with the remaining orange and red extensions tape these wires back toward the harness tape this group to the other group of wires before taping them all to the - harness
trim the turn signal that button wires as shown with our new model wiring be sure to keep the green with watch strap and pink wires tied together find the turn signal switch connectors and pull them along the dash harness take both connectors individually for about 6 inches then tape them together for about a foot
take the - harness a little past the turn signal mark on the table then take the turn signal wires to the harness solder a pink and white ten-foot extension wire to the pink and white headlamp low beam control wire pull the extension around the screw near the BCM and along the main harness solder the extension to the pink and white main harness wire pull the remaining loose wires out of the turn signal switch wires
double over the turn signal wires to take up the slack grab the clutch and brake connectors tape up about 10 inches of each one and then tape them together for a few more inches aim the connectors

as shown and then tape them to the dash harness at the clutch and brake mark untie the knotted wires find the knotted brake pedal wires draped over the BCM solder these wires to the brake pedal wires find the tan clutch wire drape over the BCM it should have been tagged earlier solder this wire to the tan wire coming from the clutch pedal connector use 8-foot light green and great extensions to extend the remaining clutch pedal wires keep in mind your wire color will vary depending on the year model and trim
start of the extensions to the corresponding wires in the main harness grab the accelerator pedal and brake reservoir connectors tape about 10 inches of both of these connectors before typing them together for a few more inches you'll have to untie the pink reservoir connector wire name the connectors as shown and take the wires near the accelerator and brake mark find the paint nut and wire near the BCM pull it toward the dash harness solder it to the pink reservoir wire pull the accelerator pedal wires around the screw and towards main harness use four-foot extensions to extend the pedal wires find the pedal wires in the main harness and pull them toward the extensions start of the main wires to the extensions near the fuse box housing you'll find a leftover positive power wire you can fold this wire over and seal it with a piece of heat shrink if you have a regular boost gauge you'll need to extend the leftover ten wire to the connector on the dash harness otherwise just fold it and add heat shrink find the ambient light sensor connector tape the wires until the tape

is in line with the EPS mark when you
pull the wires tight tape it to the
harness at the EPS mark find the read
with watch strap and purple wires at the
BCM pull them along the dash harness and
tape them near the EPS mark
find the TPMS receiver connector and
tape up about a foot of the wires tape
this near the BCM is shown collect all
of the loose green wires from near the
BCM and in the dash harness
solder all of these wires together
in the next video we'll complete the
harness subscribe to our channel and
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W11
in this video we'll finish the Goblin
wiring harness take four six-foot black
ground wires near the BCM grab three of
the bundles of ground wires with at
least 18 wires total and start a donor
bolt through all of the ground lugs
don't forget the power-steering ground
lug use pliers to close the ground lugs
up closer to each other tape just over a
foot of the ground wires pull the
largest ground wire toward the BCM then
pull eight of the smaller wires out with
the largest ground place the taped up
grounds near the clutch and brake mark
and tape it to the harness
after you tape the ground lug bundle to
the harness pull these wires down as
shown to keep them from getting mixed up
with the other grounds grab the large
ground wire near the BCM and solder it
to the large ground coming from the lugs
solder the foreground extension wires to
four of the ground wires coming from the
lugs after soldering all four pull the
slack toward the BCM solder the loose
ground wire near the cell and break mark
to one of the ground lug wires do the
same for the remaining loose grounds
near the BCM
solder the two orange turn signal wires
to two of the ground lug wires repeat
this process for the remaining - harness
grounds the total number of grounds will
vary depending on your donor year and
trim after the ground wires are soldered
use a test light to check the grounds
clamp to the ground lugs and test the
light at the lugs one by one go through
the - connectors to check the grounds
this will include the theft-deterrent
connector - turn signal switch
connectors to orange turn signal wires

RPD or boost gauge connector button
panel ground two pins on the instrument
cluster connector two pins on the o ve -
port power steering connector brake
reservoir connector BCM connector vcm
multi-plug
forground extension wires and the TPMS
receiver
start taping up the harness near the
turn signal wires
stop a few inches past the loose red and
purple wires fold over the tip of the
red wire and any piece of heat shrink
roll up the wire in zip tie it to the
harness continue taping the harness
notice how we double back around some of
the wires coming out of the harness
stop taping about eight inches from the
BCM roll up the purple wire in the same
way as the red wire move to the main
harness and tape it up moving toward the
BCM stop where the main harness meets
the dash disconnect the BCM and set it
aside do the same for the ignition
switch fold the harness over as shown
try to get your harness to match the
shape of our harness tape just above the
junction to hold the wires together pull
the loose wires together and aim them to
the right
finish taping this area as shown
[Music]
[Music]
pulled out the loose wires and start
taping them about two feet from the main
junction tape up several inches until
you get past the 50 amp fuse once you
get past that point
add the fused wire and continue taping
all the way to the junction
pipe up the heat exchanger fan wire with
one of the black ground wires
solder another one of the ground wires

to the black horn wire
tape up the horn wires grab the first group of head live wires and one of the ground wires tape up these wires repeat the process for the other set of headlight wires continue taping up to the 50 amp fuse next you'll trim the headlight wires flush to the ground wires before cutting them mark the ends with strips of tape
at this point your Goblin wiring harness is ready to go
subscribe to our channel and click the bell icon to get notified when our new videos go love if you have any questions send us an email give us a call or join our forum thanks for watching