



1995 CHEVROLET CAPRICE



WIRING SCHEMATIC



PLEASE DO NOT

cut or modify

any CHP wiring in any manner.



The new generation of CHP wiring harness has been engineered and designed for the following criteria: to fit in other marked CHP vehicles, be reusable, user friendly, and to be compatible with optional and future CHP equipment. We no longer discard the wiring from “run out” vehicles. The harness in these vehicles will be removed and reinstalled into new vehicles. Private vendors have priced the CHP main fuse block harness at \$600.00.

There are four spare connectors in the CHP Main Fuse Block Harness that is located inside the center console. These connectors are used to power up other approved electrical devices that are not part of Motor Transport Section (MTS) installed equipment such as an allied agency radio. Two of the connectors contain wiring that have: battery “hot”, control head “hot”, and ground (one being isolated). The other two contain: battery “hot”, ignition “hot” and ground. Motor Transport Section, Engineering Unit will send the mating connector with a pig tail that has your requested wire length. There are also some spare connectors in the Containment Box that is located in the trunk.

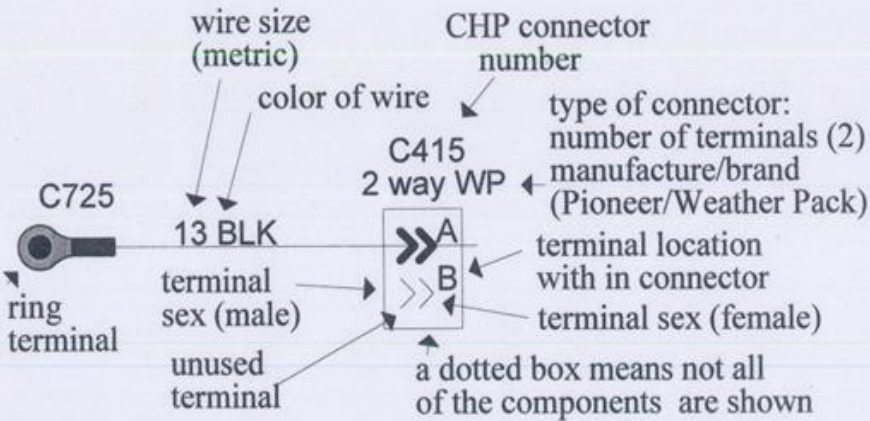
Motor Transport Manual (HPM 31.1, Chapter 1, Paragraph 6, Standard Equipment) states:

- a. Factory Installed Equipment. Parts, accessories, and components supplied by the manufacturer as standard equipment are not to be removed, replaced or modified unless provided for in instructions issued by MTS.
- b. CHP Equipment. Any enforcement equipment installed by MTS is not to be removed, replaced, modified unless provided for in instructions from the Assistant Commissioner Field, or from MTS.

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HOW TO READ THIS SCHEMATIC

All WIRES are 1mm (16ga) unless indicated,

CHP wiring is indicated by _____

Factory wiring is indicated by _____ - _____

TYPES OF FONTS USED ON THE SCHEMATICS

Aerial

Times New Roman

Cad Block

cad slant

Name of the Object

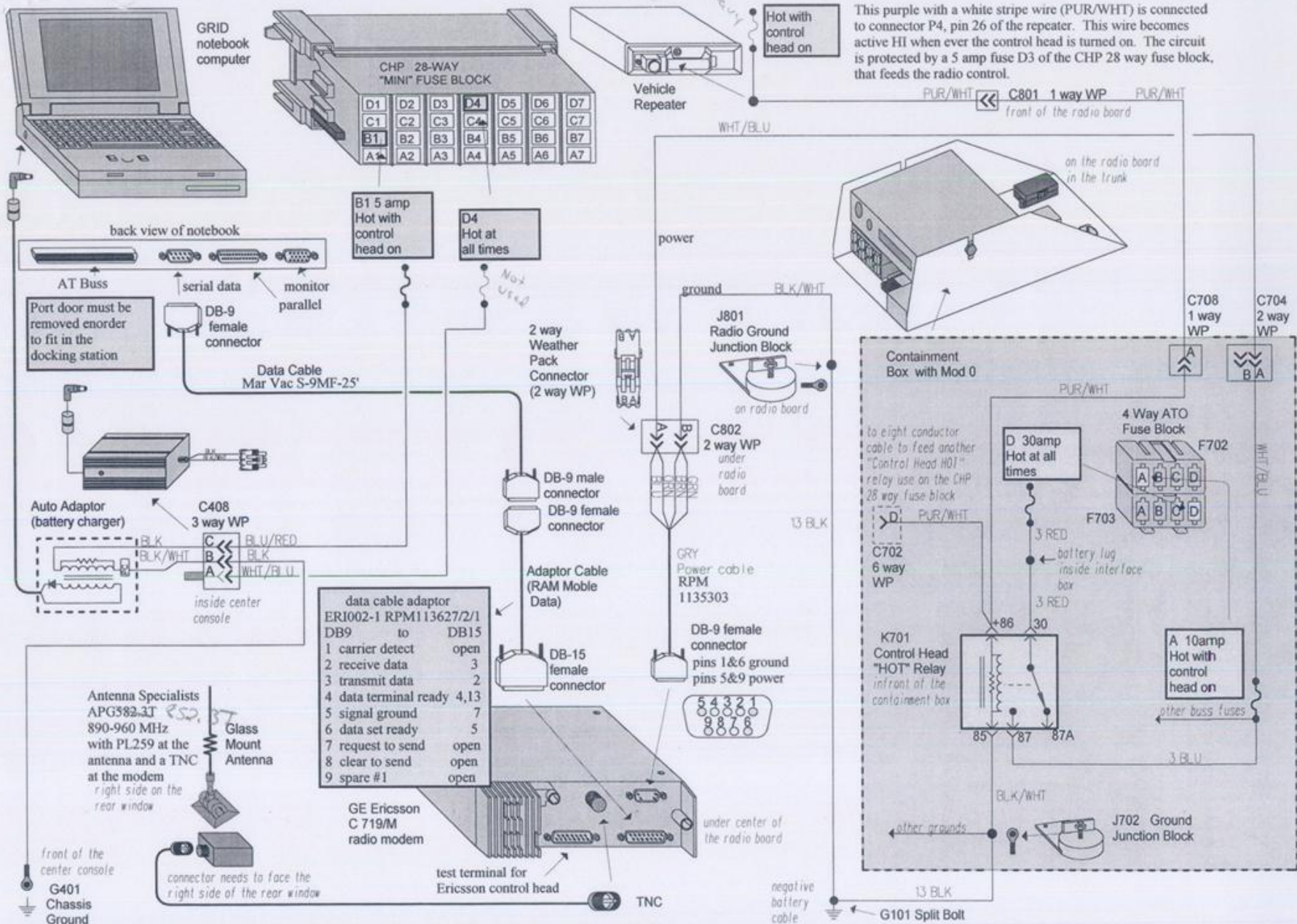
Information on the object

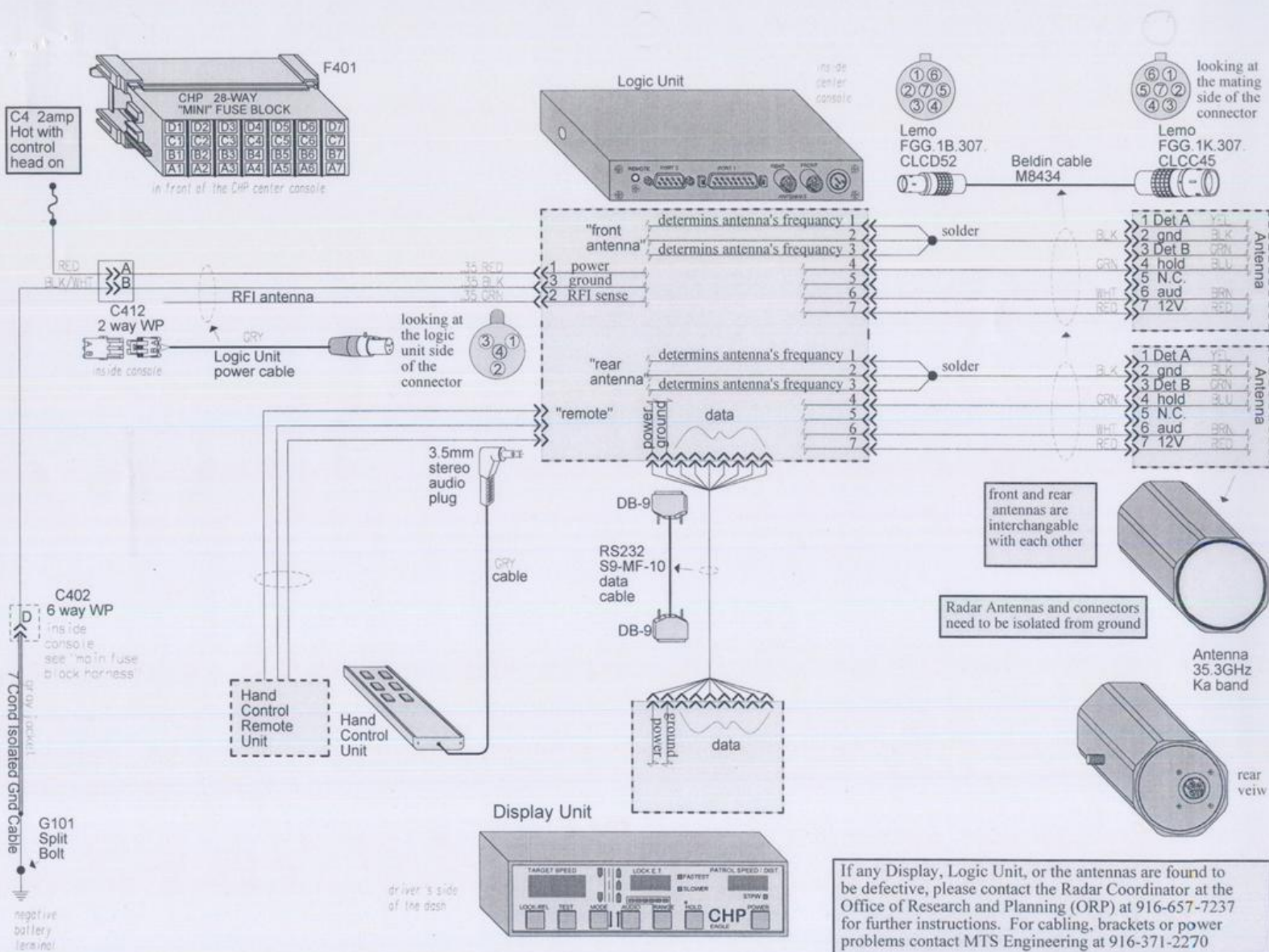
Size and color of the wire

location of the object

NEW FOR THE 1995 VEHICLES

CHP's Main Fuse Block now contains: 10 fuses that are battery hot, 10 fuses that are ignition hot, and 8 fuses that are radio control head hot. The Containment Box is setup for a computer, and has additional 4 way ATO fuse holder that is "control head hot". All E-class Sedans are computer ready, and are being equipped with a DB-9 RS232 data cable, and modem antennas (except Northern Division). The scanner audio will come from the factory door speakers instead of the gun tub. The old whip antenna that was mounted on the right rear quarter is now a base loaded antenna and moved to the roof. The repeater, and computer modem antennas are glass mount. All wiring is reusable for future vehicles so **PLEASE DO NOT CUT, MODIFY, or CHANGE ANY WIRING HARNESS**. Both the Eagle and Hawk Radars will still be hard wired in at MTS as the vehicles are being built, so please notify on the CHP 57's a request for radar.





If any Display, Logic Unit, or the antennas are found to be defective, please contact the Radar Coordinator at the Office of Research and Planning (ORP) at 916-657-7237 for further instructions. For cabling, brackets or power problems contact MTS Engineering at 916-371-2270

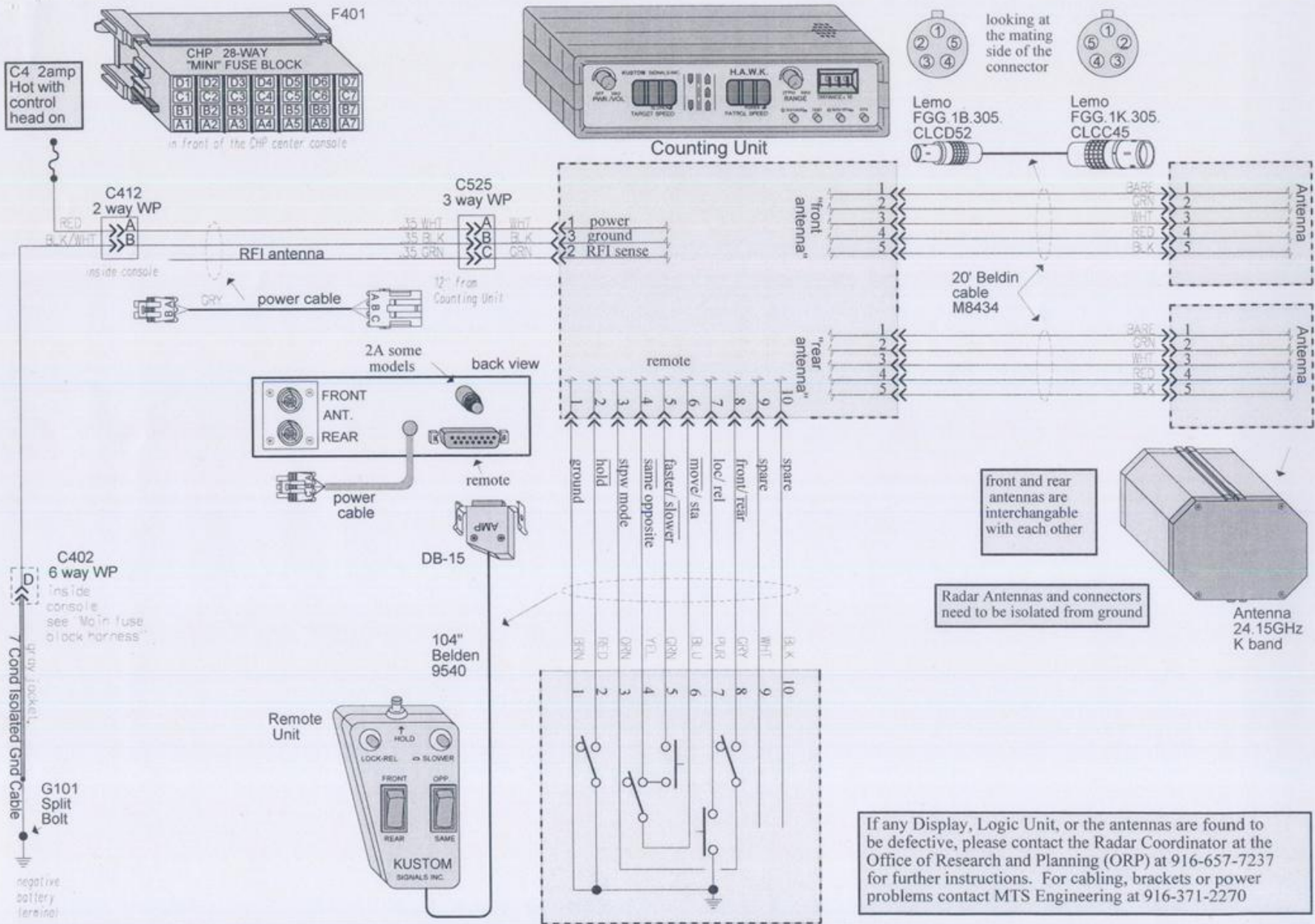


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Oil Change Indicator Lamp Has been disconnected and will set a Diagnostic Trouble Code 95 (DTC) in the Powertrain Control Module (PCM) in memory. This trouble code is to be disregarded. For more information see "Component Operation Information" section.

Speedometer Illumination Blanking switch. Located on the right side of the heater control center dash panel. Pressing this button with out head lights being on will cancel the speedometer display, pressing it again will restore the display. This feature can be useful when trying to approach a scene with out being detected because of interior lighting. This function is disabled when the head lights are active. For more information see the "Component Operation Information" section.

SUPPLY SERVICES

Part #	Unit	Description	Part #	Unit	Description	Part #	Unit	Description
7-275-45	ea.	20 Amp Maxi Fuse	7-275-40	ea.	01 amp ATC fuse	7-275-66	bx.	02 Amp Mini Fuse
7-275-50	ea.	30 Amp Maxi Fuse	7-275-31	ea.	02 amp ATC fuse	7-275-67	bx.	05 Amp Mini Fuse
7-275-55	ea.	40 Amp Maxi Fuse	7-275-33	ea.	05 Amp ATC Fuse	7-275-68	bx.	10 Amp Mini Fuse
7-275-57	ea.	50 Amp Maxi Fuse	7-275-34	ea.	10 Amp ATC Fuse	7-275-69	bx.	15 Amp Mini Fuse
7-275-60	ea.	60 Amp Maxi Fuse	7-275-35	ea.	15 Amp ATC Fuse	7-275-70	bx.	20 Amp Mini Fuse
7-275-65	ea.	80 Amp Maxi Fuse	7-275-36	ea.	20 Amp ATC Fuse	7-365-80	bx.	50 watt bulb (Vision pod) \$5.25
			7-275-37	ea.	30 Amp ATC Fuse	7-365-85	ea.	27 watt bulb (Signal Master) \$4.60
						7-356-79	ea.	5 watt Littlite map/dome light bulb

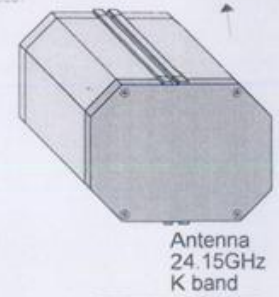
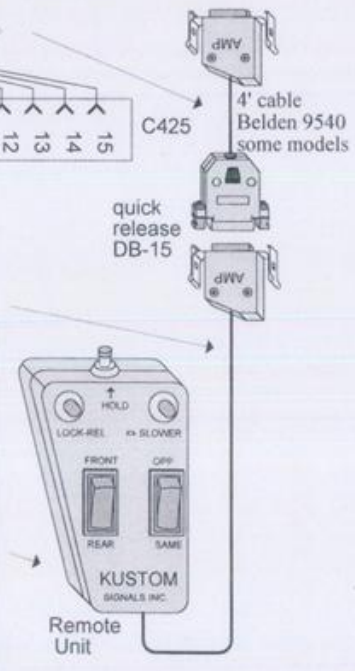
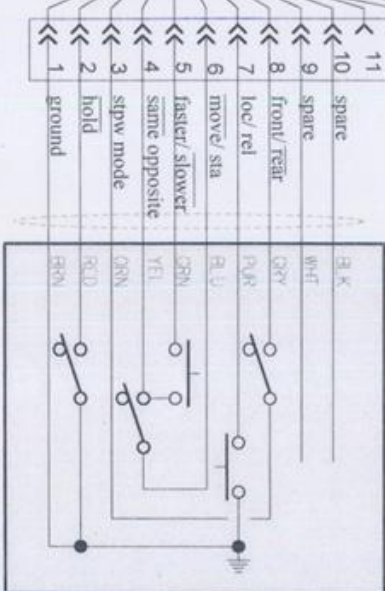
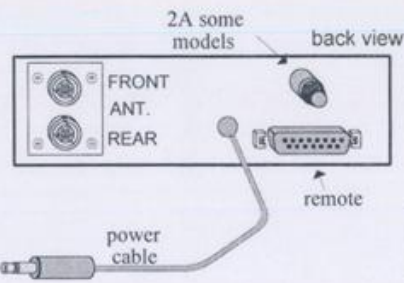
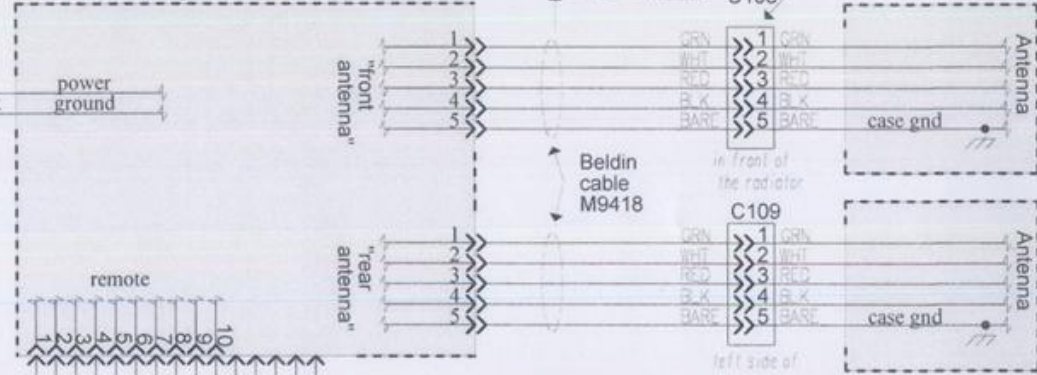
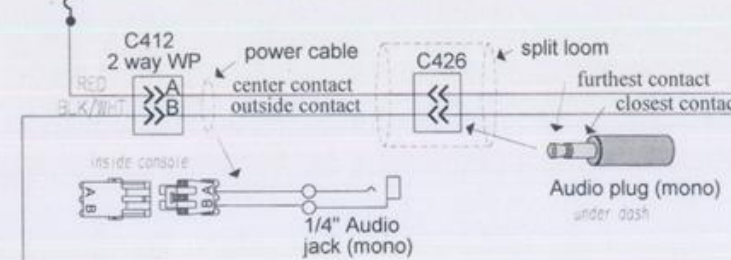
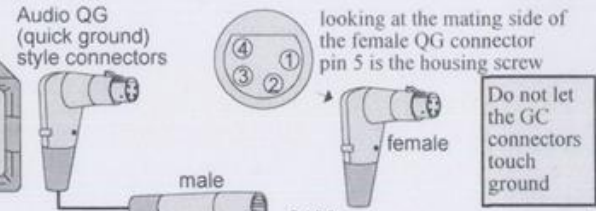
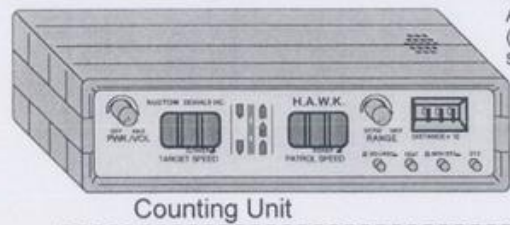
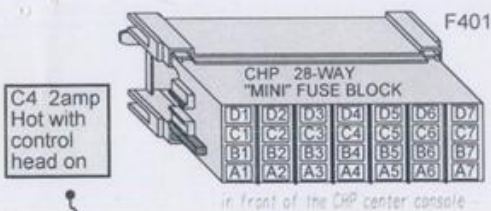
min fuses
 7-275-72 ATM 3
 7-275-73 " 7.5
 7-275-74 " 25
 7-275-75 " 30

356

NICE TO KNOW

METRIC	.5mm	.8mm	1mm	2mm	3mm	5mm	8mm	13mm	19mm	32mm
STANDARD	20ga	18ga	16ga	14ga	12ga	10ga	8ga	6ga	4ga	2ga

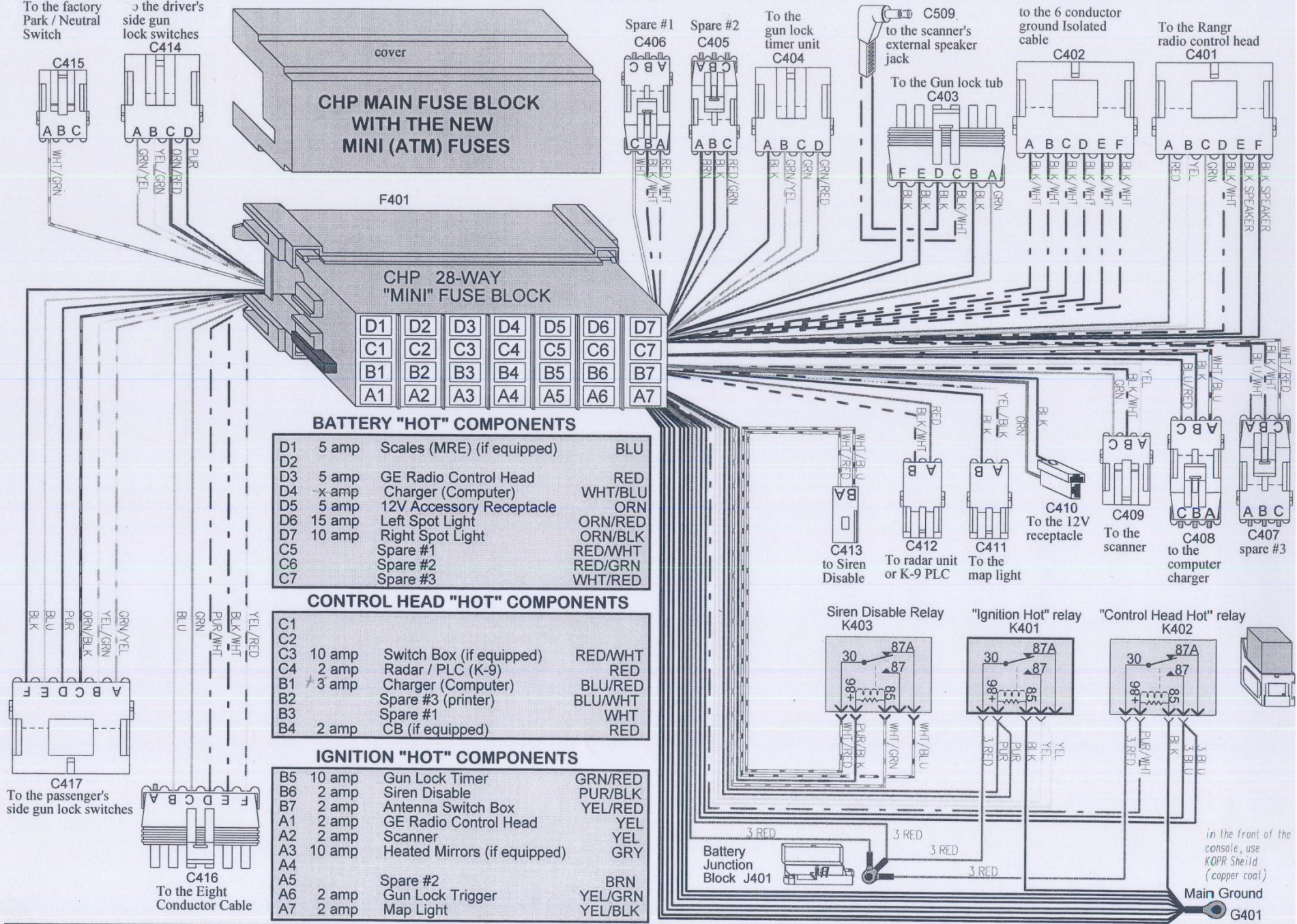
Warranty Time: Light Bars 10 years, Gun Lock 3 years, Wig Wags 5 years, all parts available through MTS.

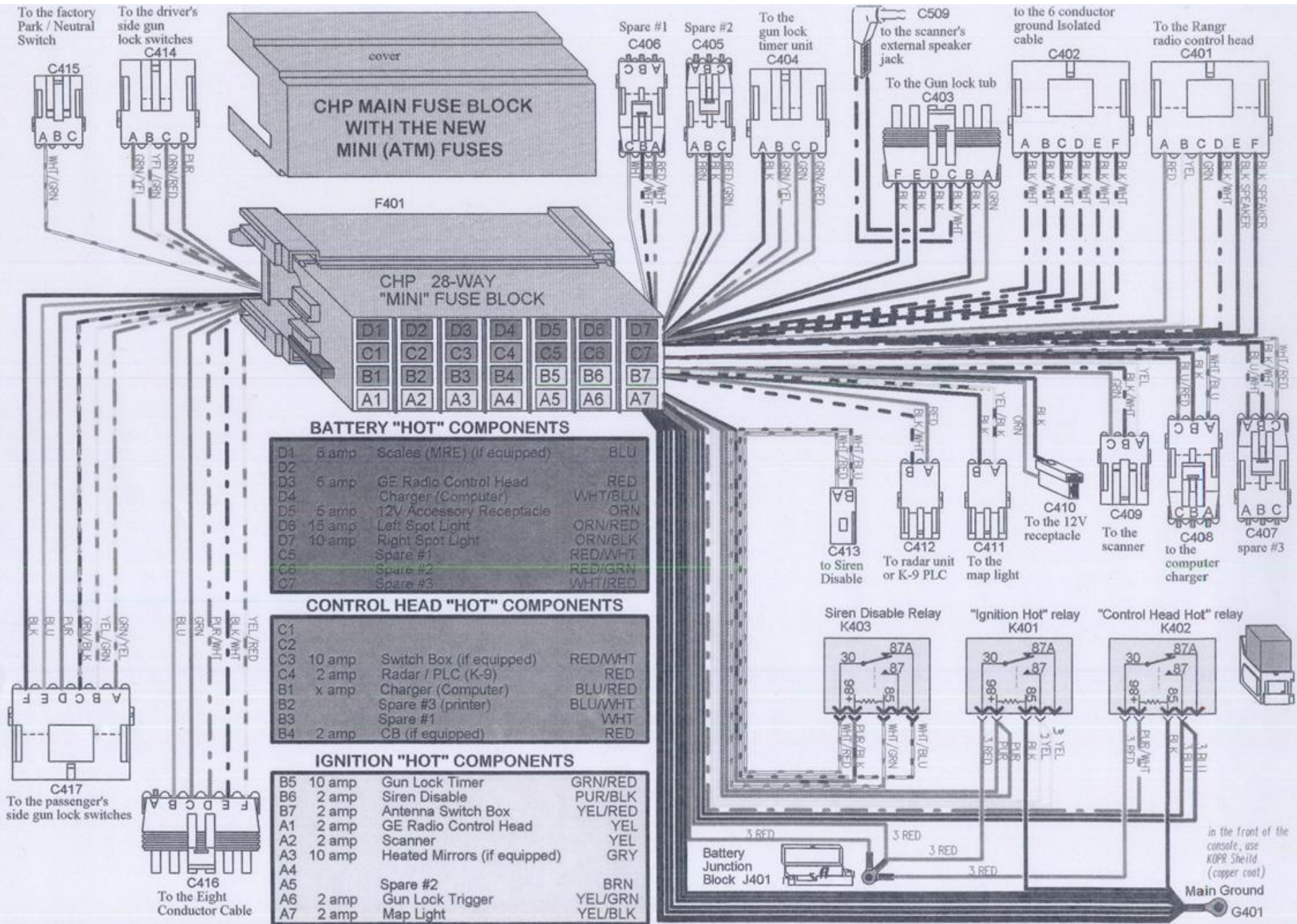


front and rear antennas are interchangeable with each other

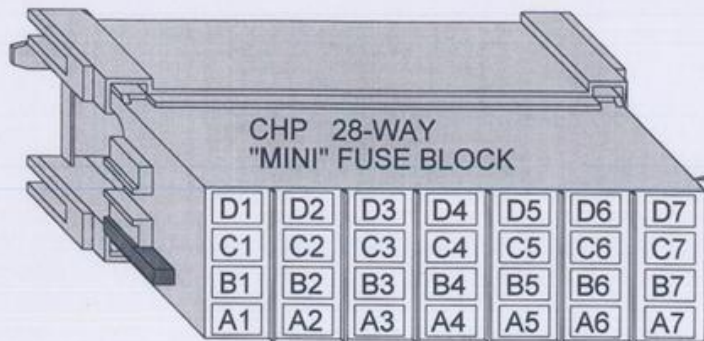
Radar Antennas and connectors need to be isolated from ground

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These connectors are added to the base CHP 28 way Main Fuse Block Harness upon equipping at Motor Transport for requested optional equipment.



to other CHP component grounds

to the Switch Box for K-9, MRE

C418



to the C.B. radio

C419



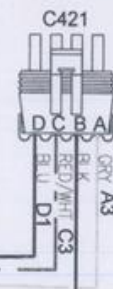
to the Heated Mirrors for Bronco, MRE

C420



to the Switch Box for MRE

C421

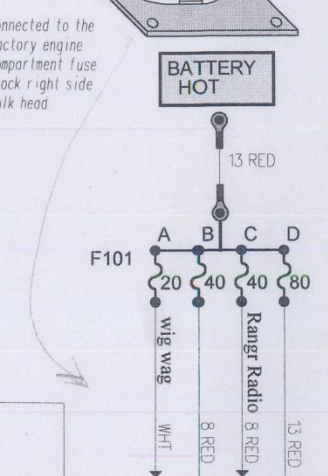
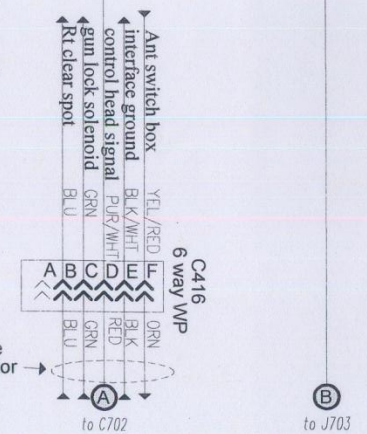
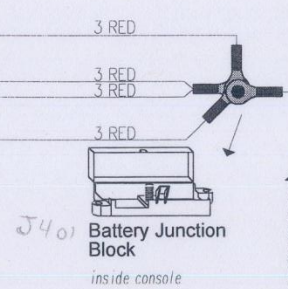
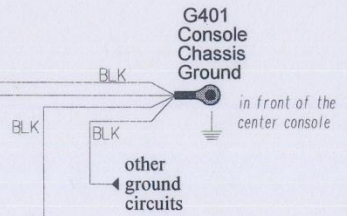
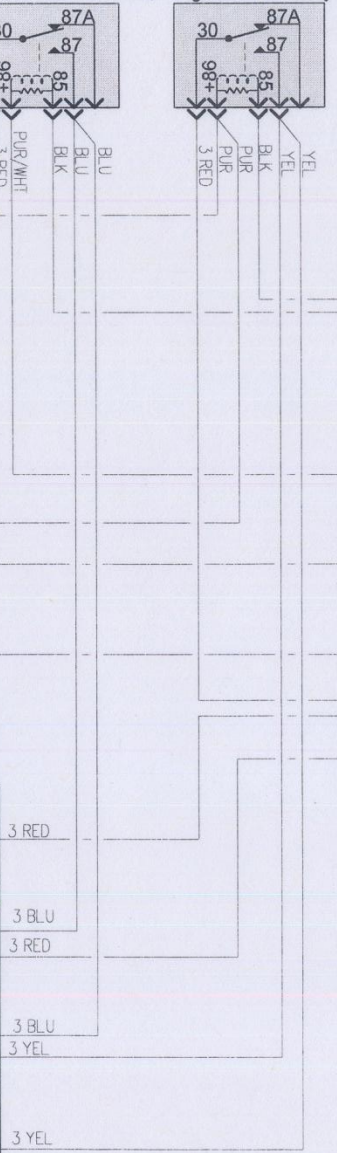
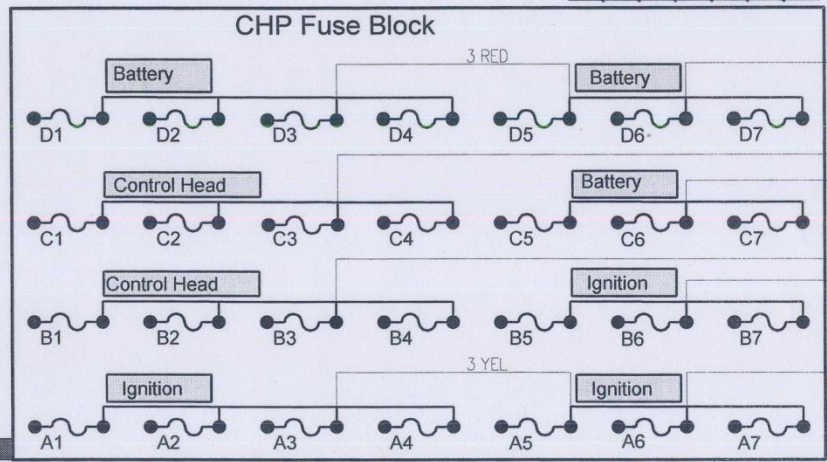
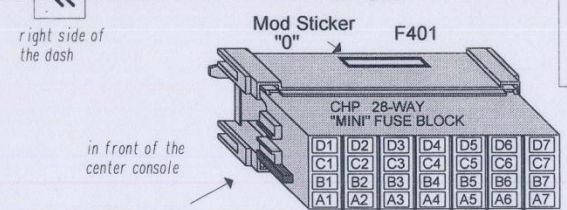
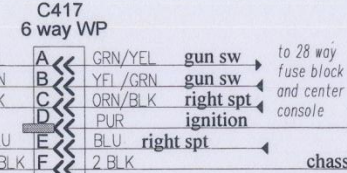
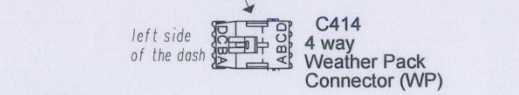
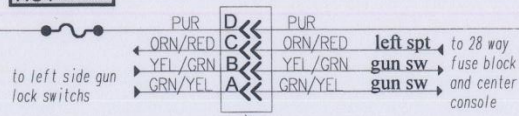
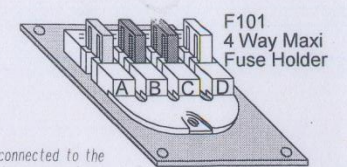
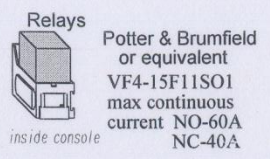
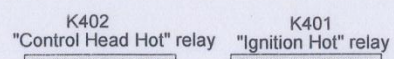
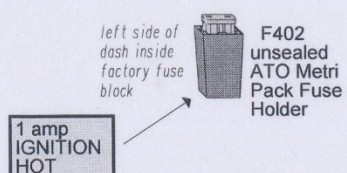


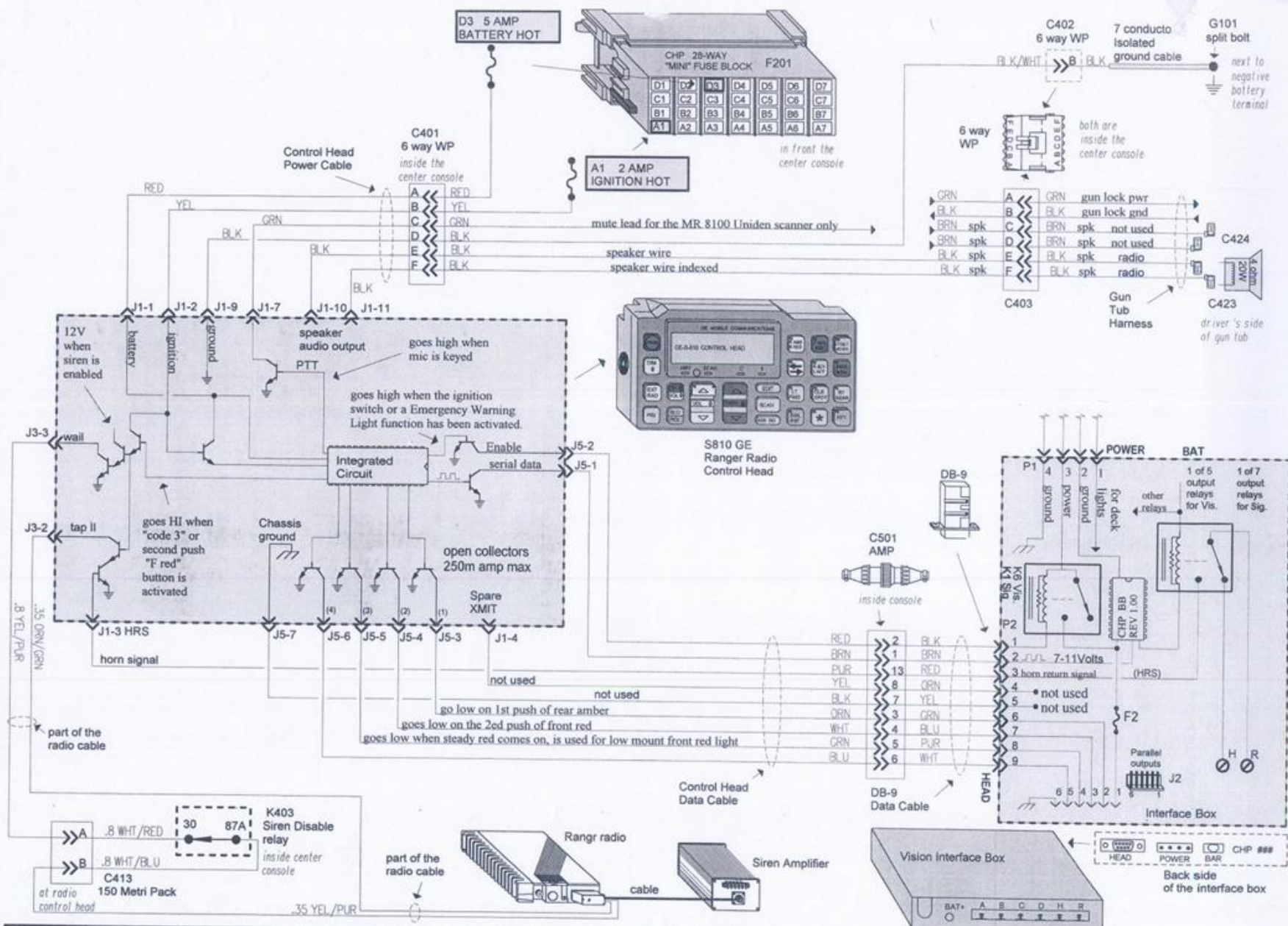
BLK

this harness is supplied on vehicles that requested a C.B. radio wiring with no radio installed



to the factory fuse box # 9 Radio "HOT" in ignition and accessory)





G.E. S810 Radio Control head



When the mic is keyed the J1-7 terminal goes low which mutes the audio in the scanner

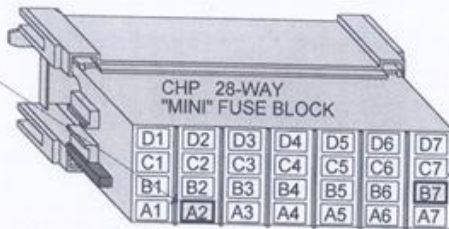
push to talk circuit

J1-7 used only on the Uniden MR 8100 scanner



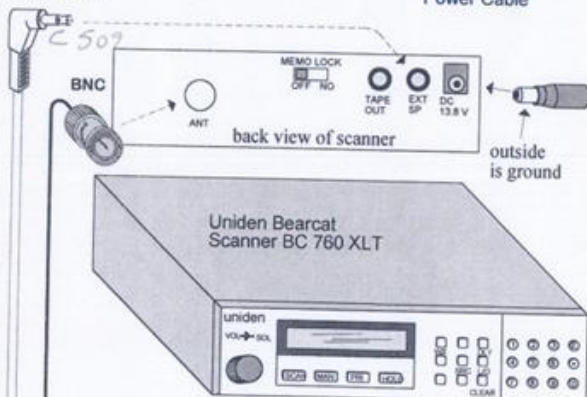
A2 2 AMP IGNITION HOT

B7 2 AMP IGNITION HOT

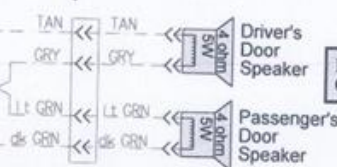


F401 in front of the center console

External Audio Plug



150 4 way Metro Pack under center of the dash by the ALCL connector



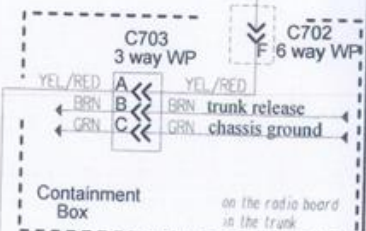
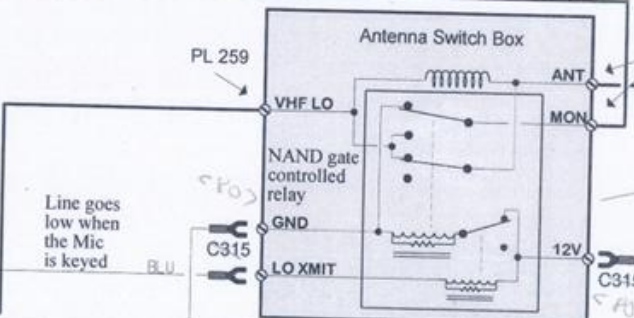
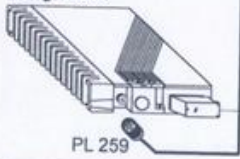
Factory Wiring CHP Wiring

Base Loaded Low Band Antenna

PL 259 Amphenol 83-58SP

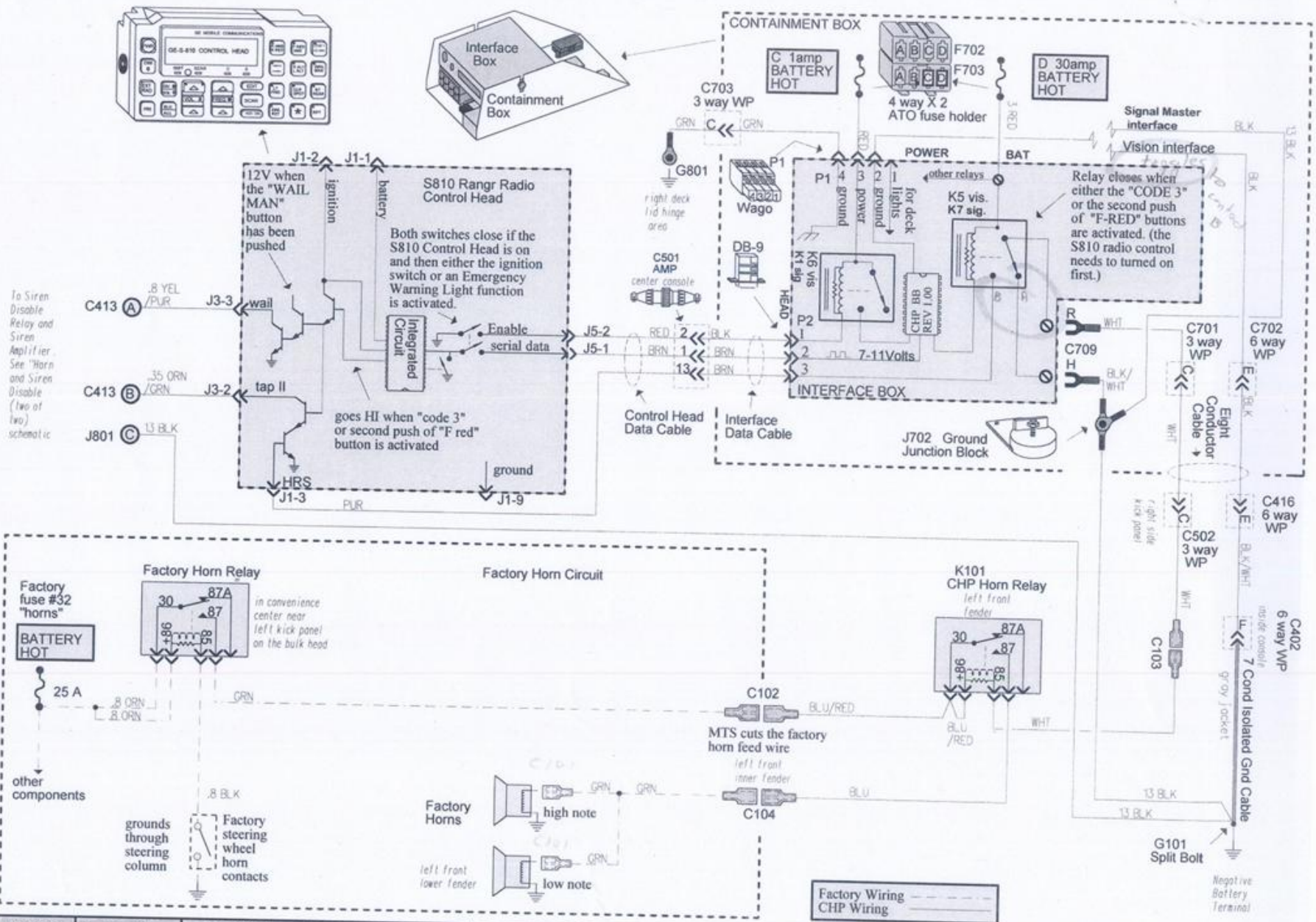


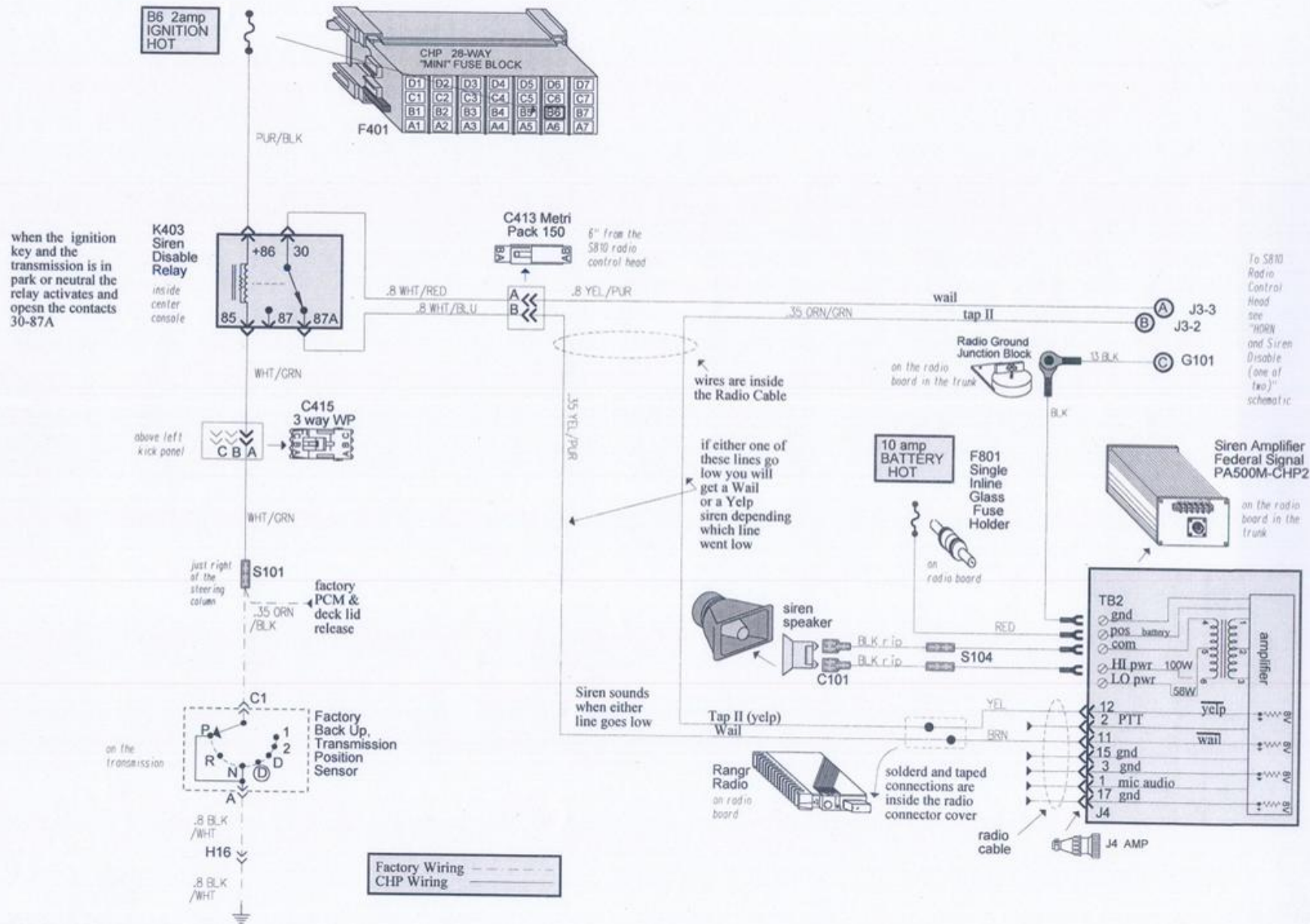
General Electric Rangr Radio

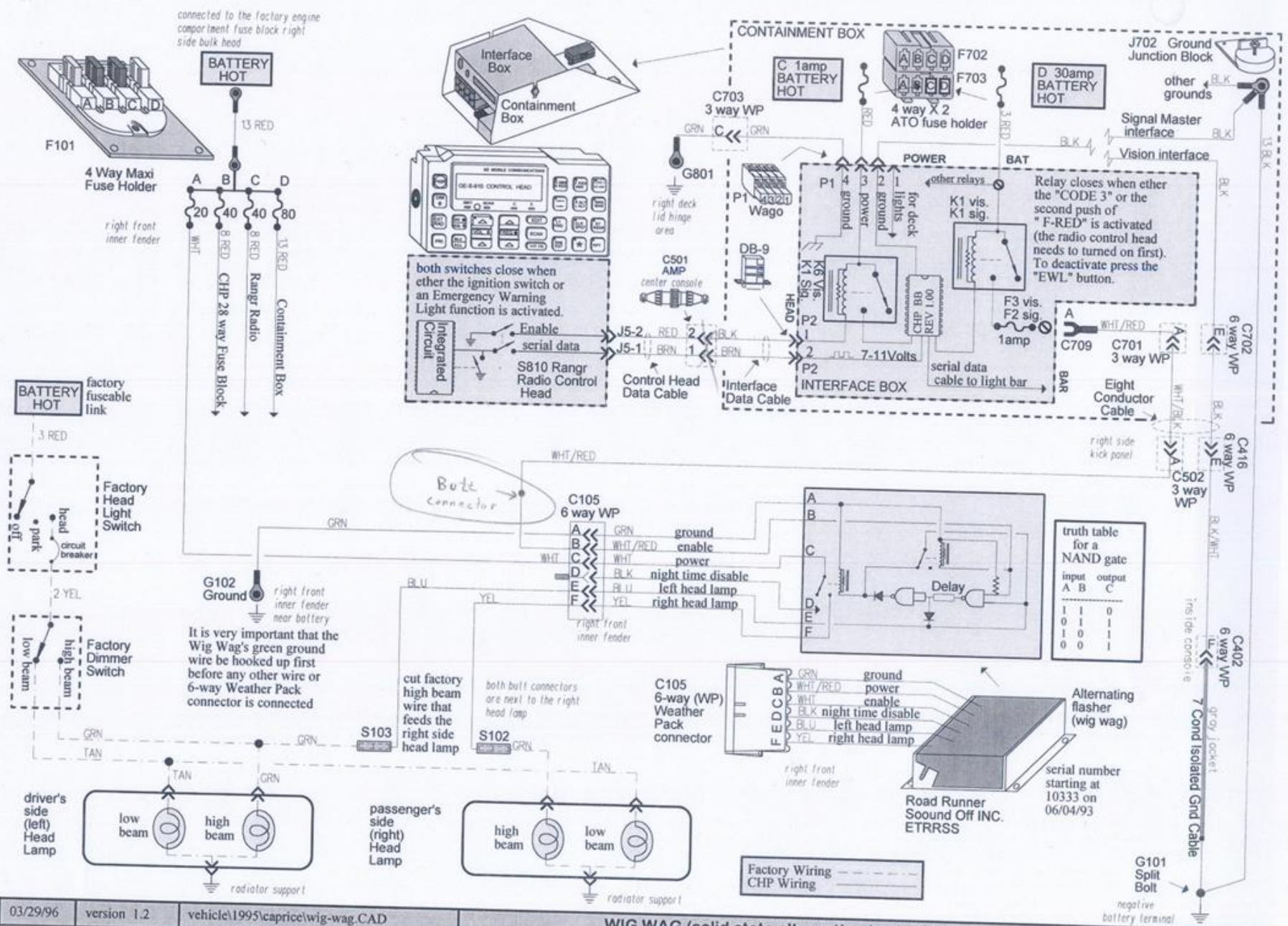


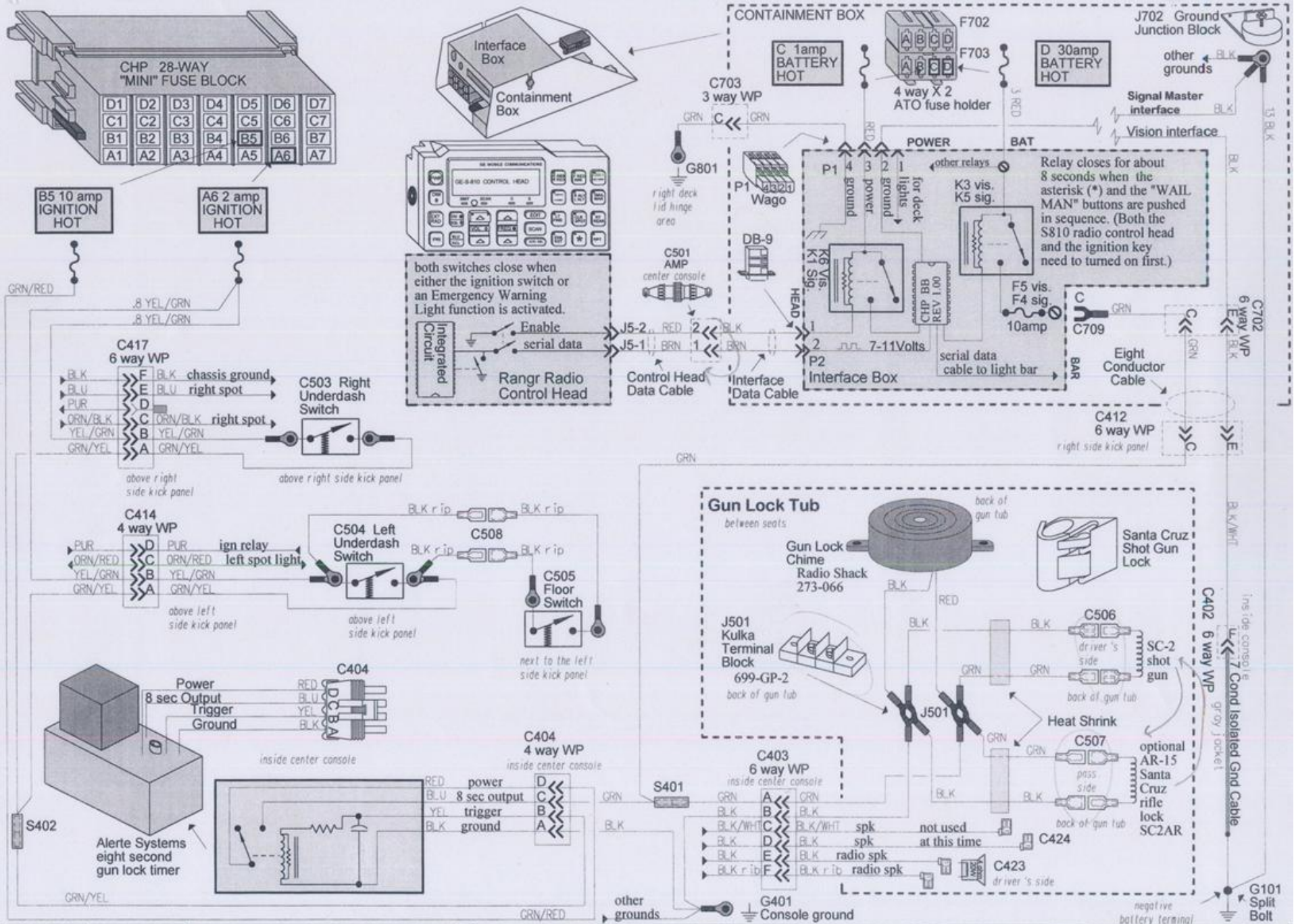
J801 Radio Ground Junction Block

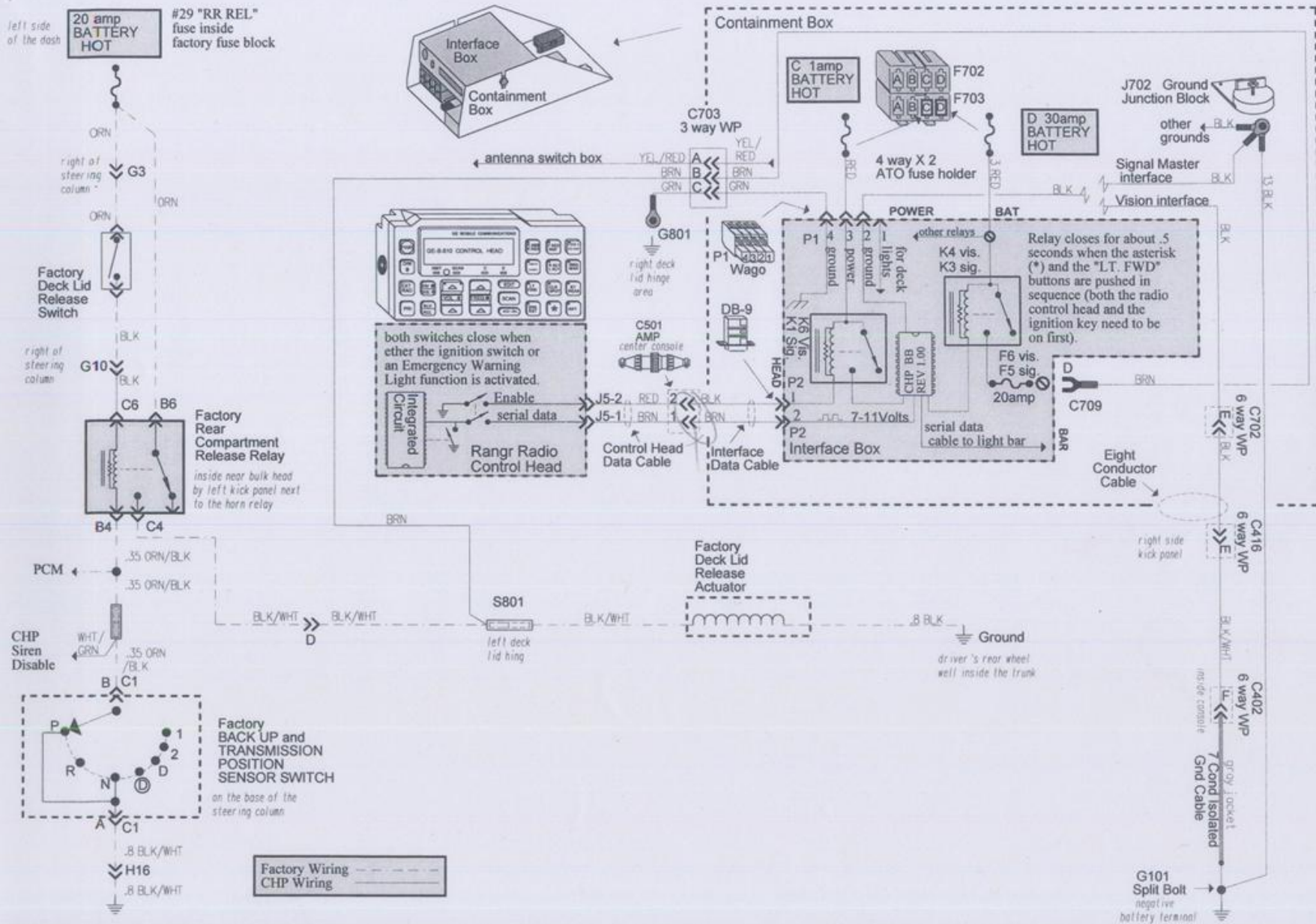
G101 Split Bolt next to negative battery terminal

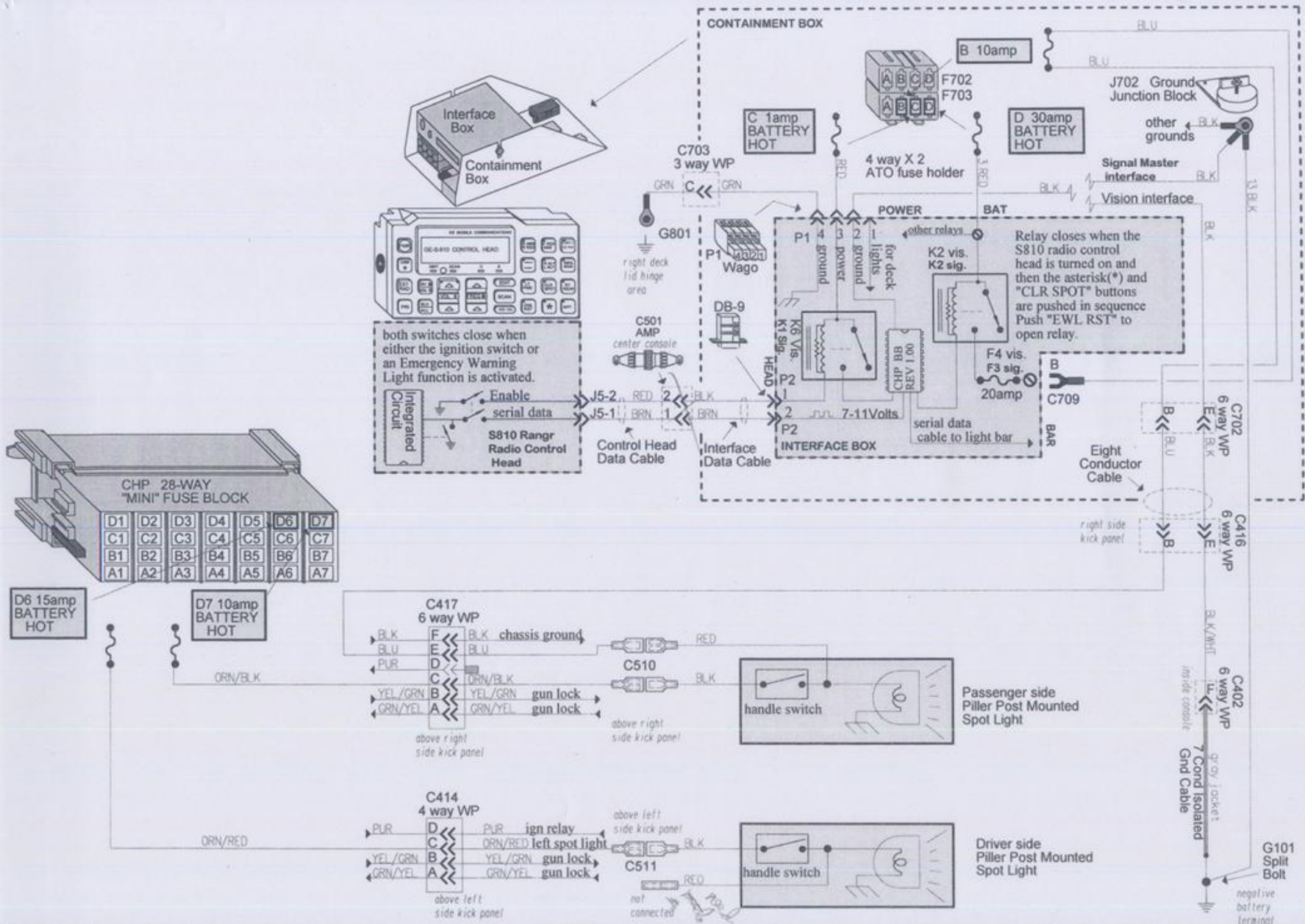


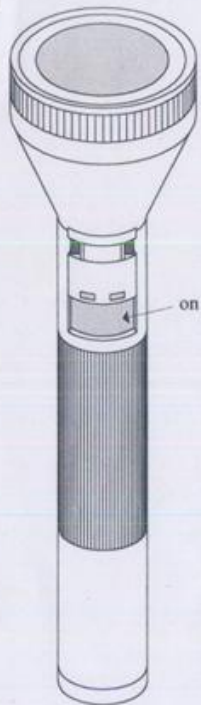








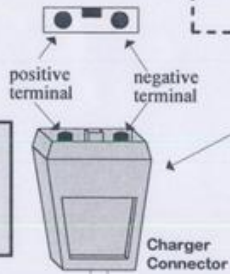
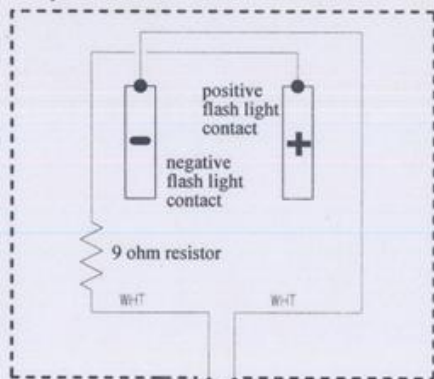




Streamlight Flashlight
model SL-20 X



Streamlight Flashlight Charger



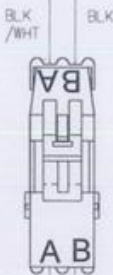
DO NOT reverse polarity damage and injury can occur

occur

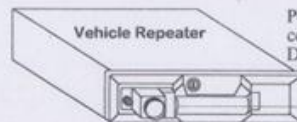
old style

BLK/WHT

BLK

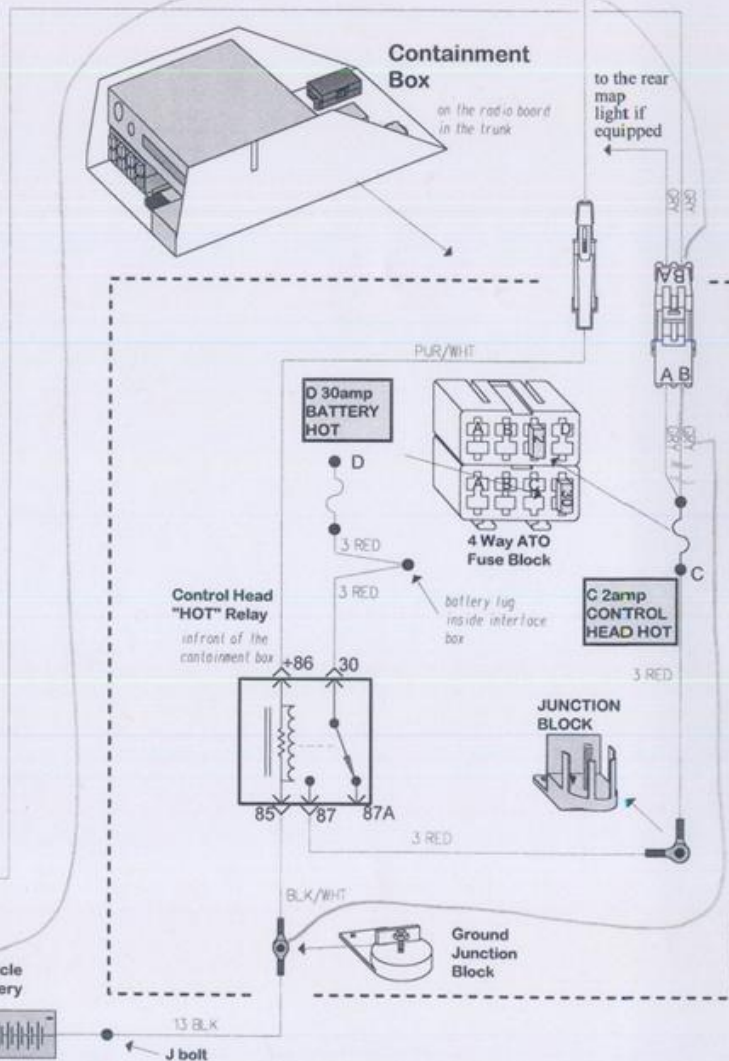
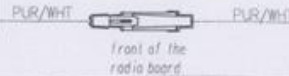


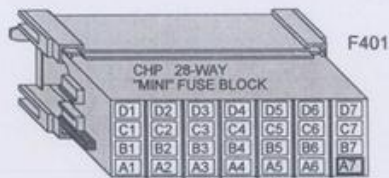
GRY



Vehicle Repeater

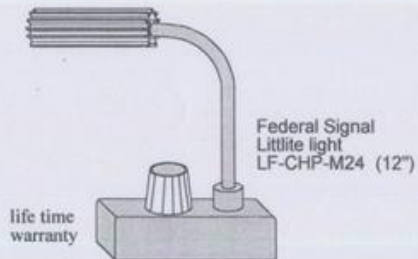
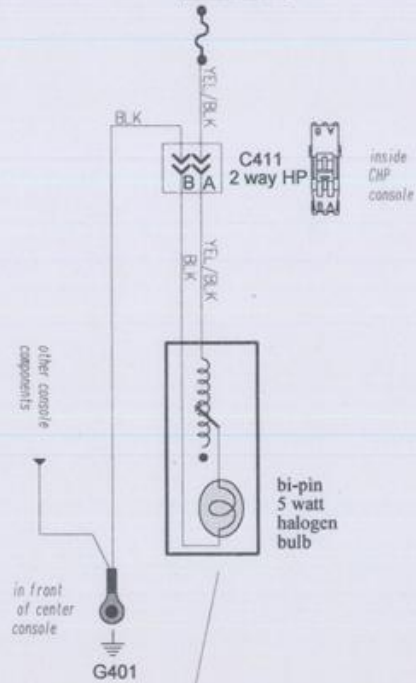
P4 pin 26 is switched +A, this pin is active HI when ever the control head is turned on. The circuit is protected by a fuse D3 5A "GE Radio Control Head" in the CHP 28 way fuse block





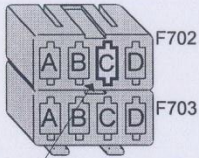
FRONT MAP LIGHT

A7 2amp
IGNITION
HOT



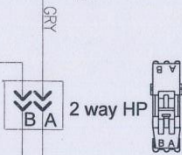
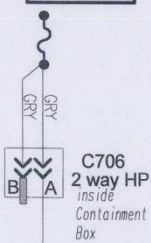
4 way X2
ATO fuse holder

in the
Containment
Box on the
radio board
in the trunk



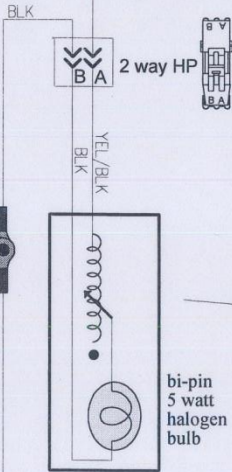
OPTIONAL REAR MAP LIGHT

C 2amp
CONTROL
HEAD HOT



other radio
board
components

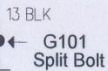
J801
radio ground
junction block
on the radio
board in the
trunk



bi-pin
5 watt
halogen
bulb

Federal Signal
Littlite light
LF-CHP-M24 (12")

life time
warranty



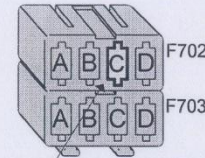
G101
Split Bolt

to the negative
battery terminal

4 X 40 X 1/12

4 way X2
ATO fuse holder

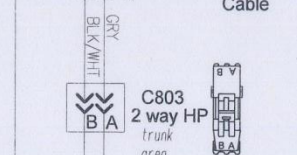
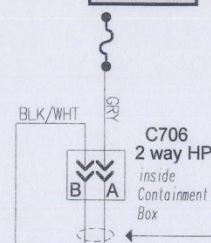
in the
Containment
Box on the
radio board
in the trunk



OPTIONAL REAR MAP LIGHT

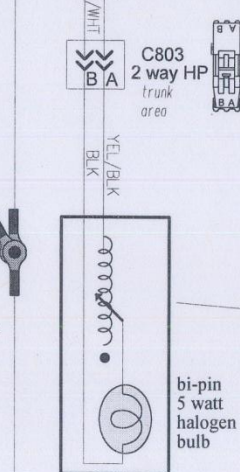
with MOD "0" Containment Box

C 2amp
CONTROL
HEAD HOT



other containment
box components

J702
Containment Box
Ground Junction Block
on the radio
board in the
trunk



bi-pin
5 watt
halogen
bulb

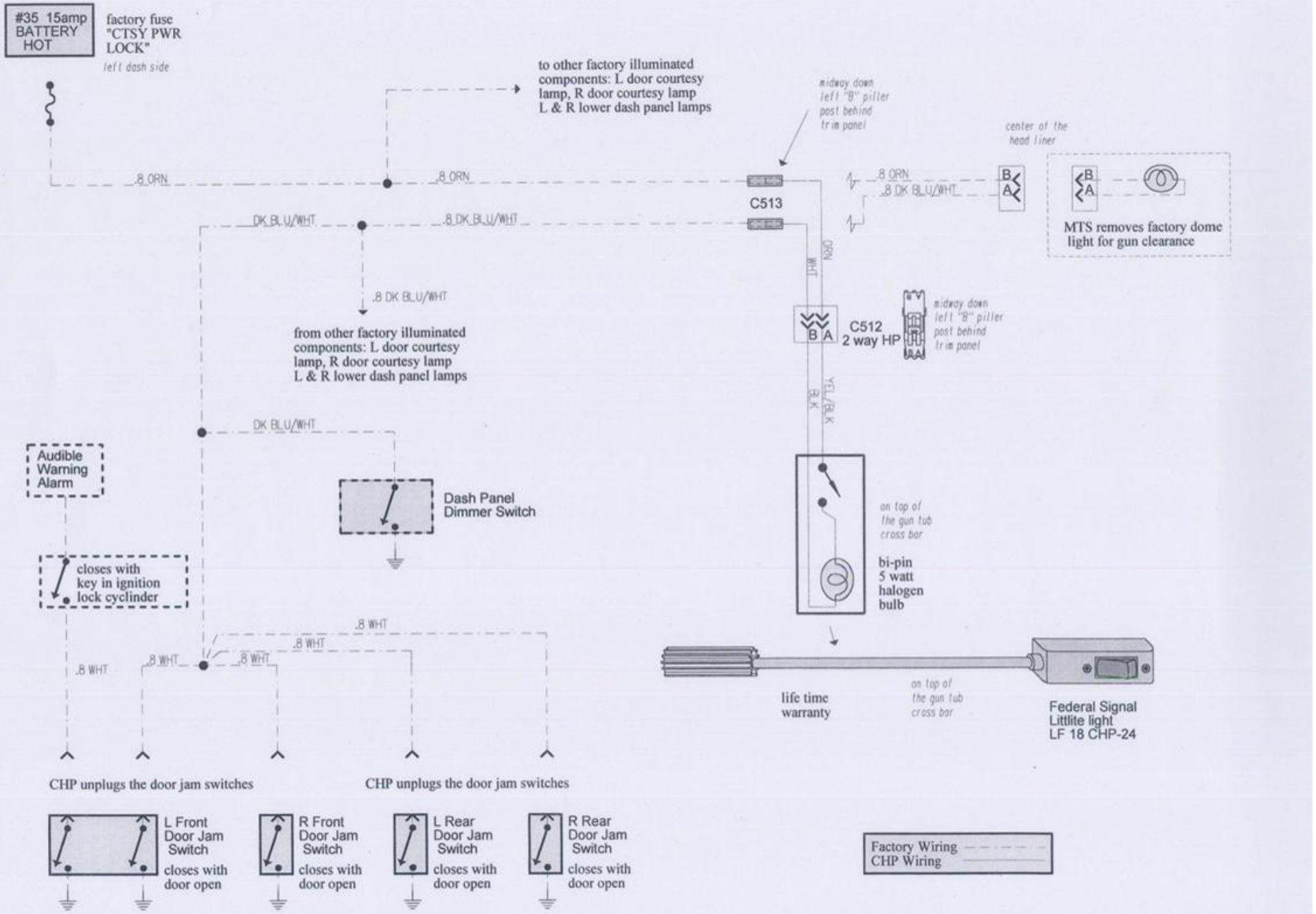
Federal Signal
Littlite light
LF-CHP-M24 (12")

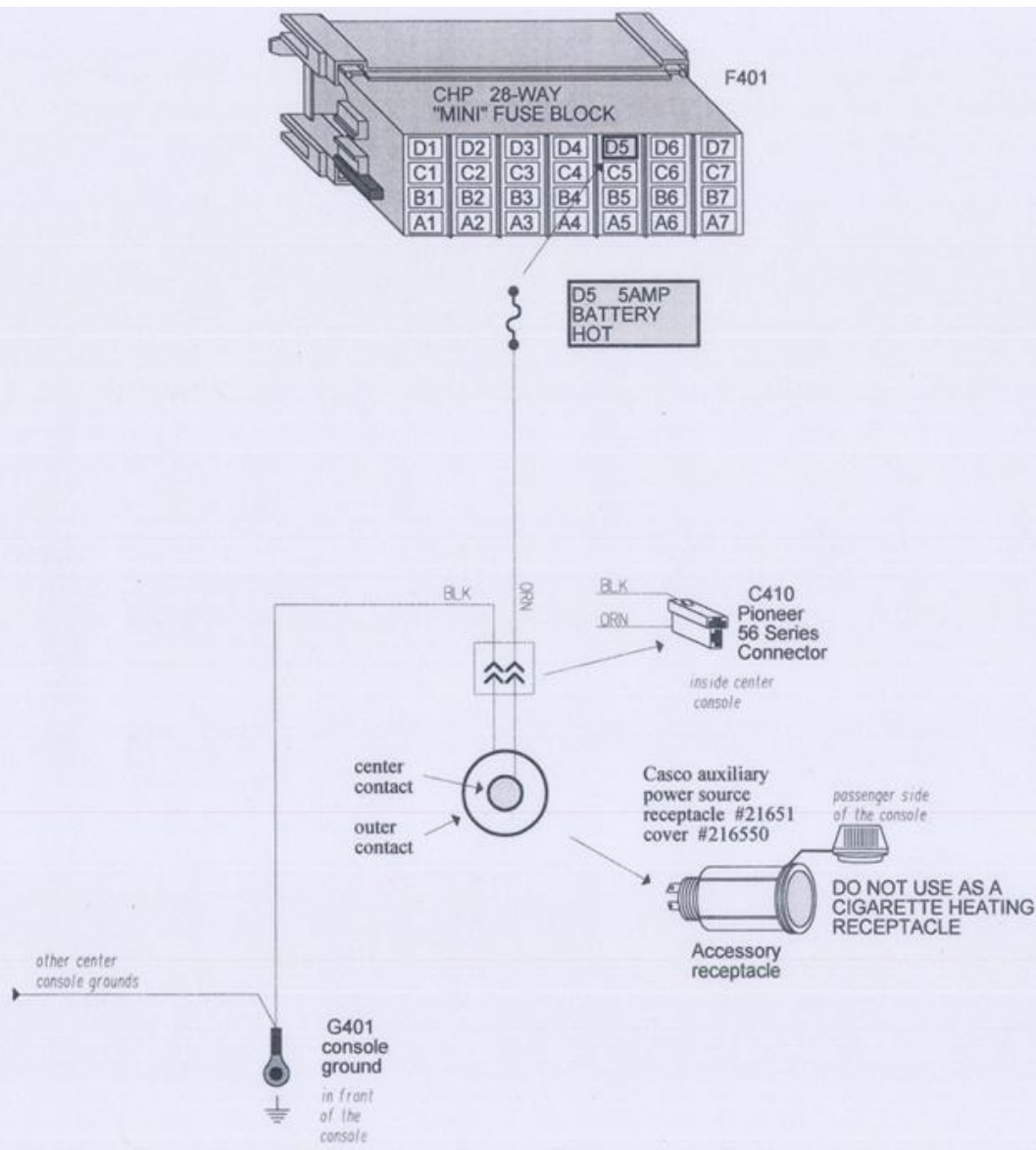
life time
warranty

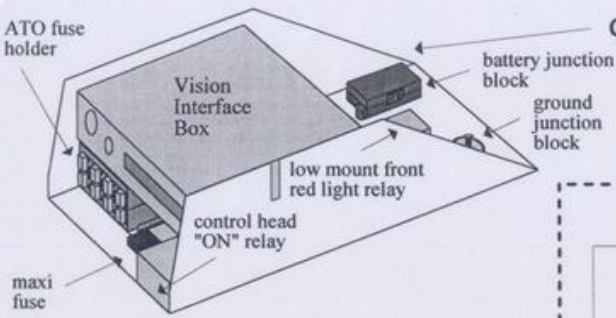


G101
Split Bolt

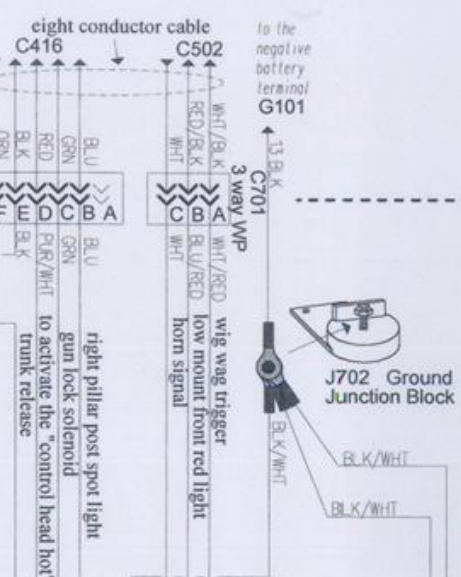
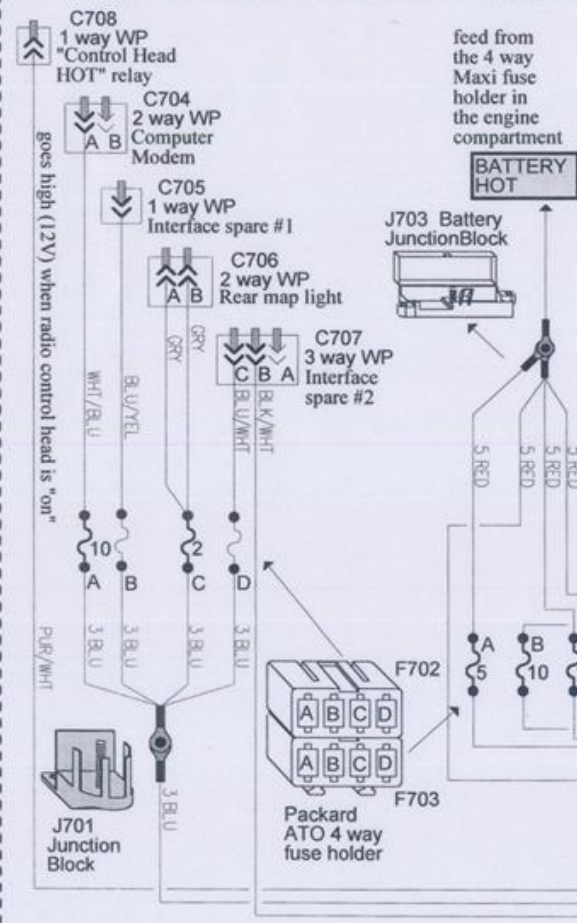
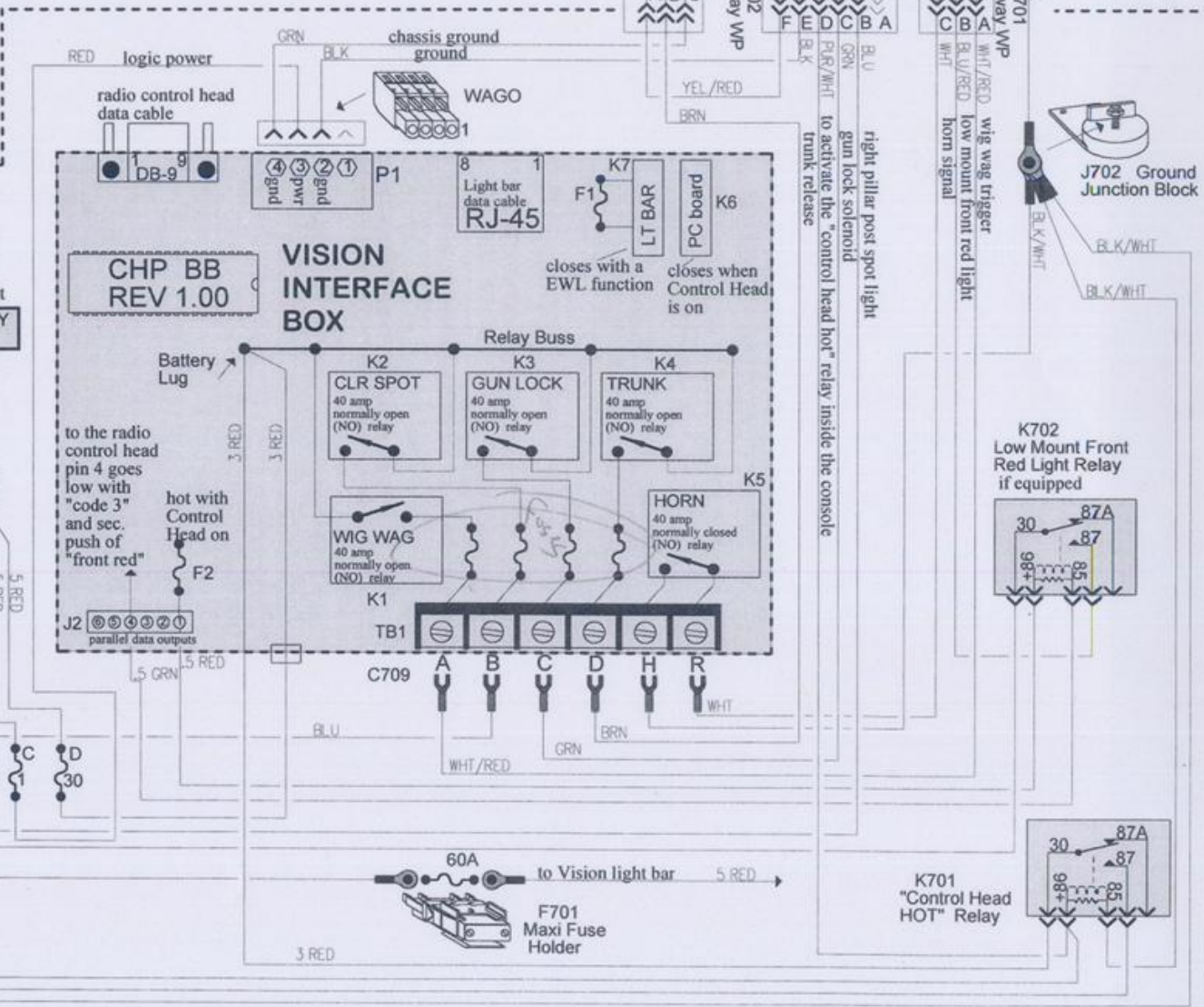
4 X 40 X 1/12

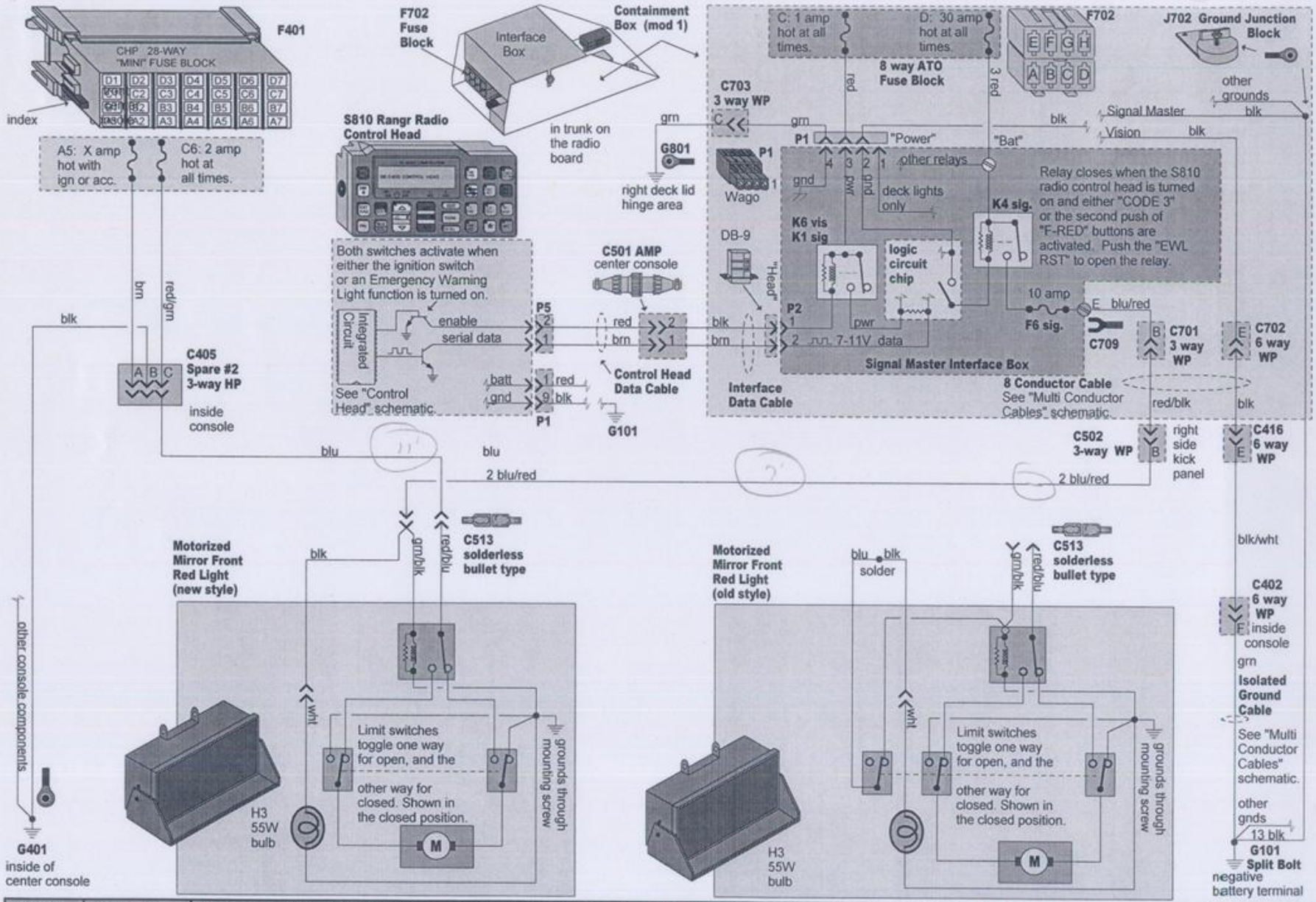


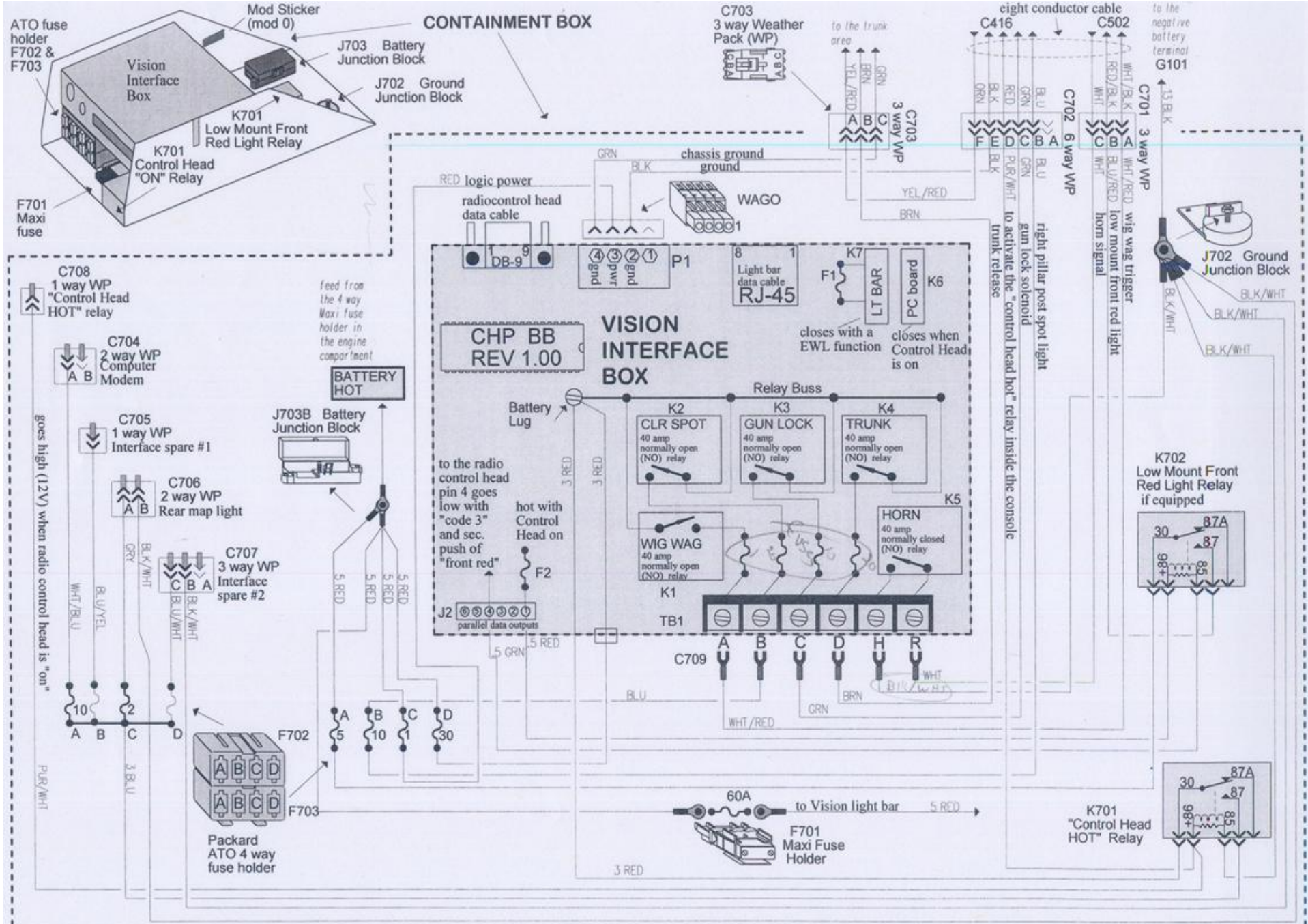


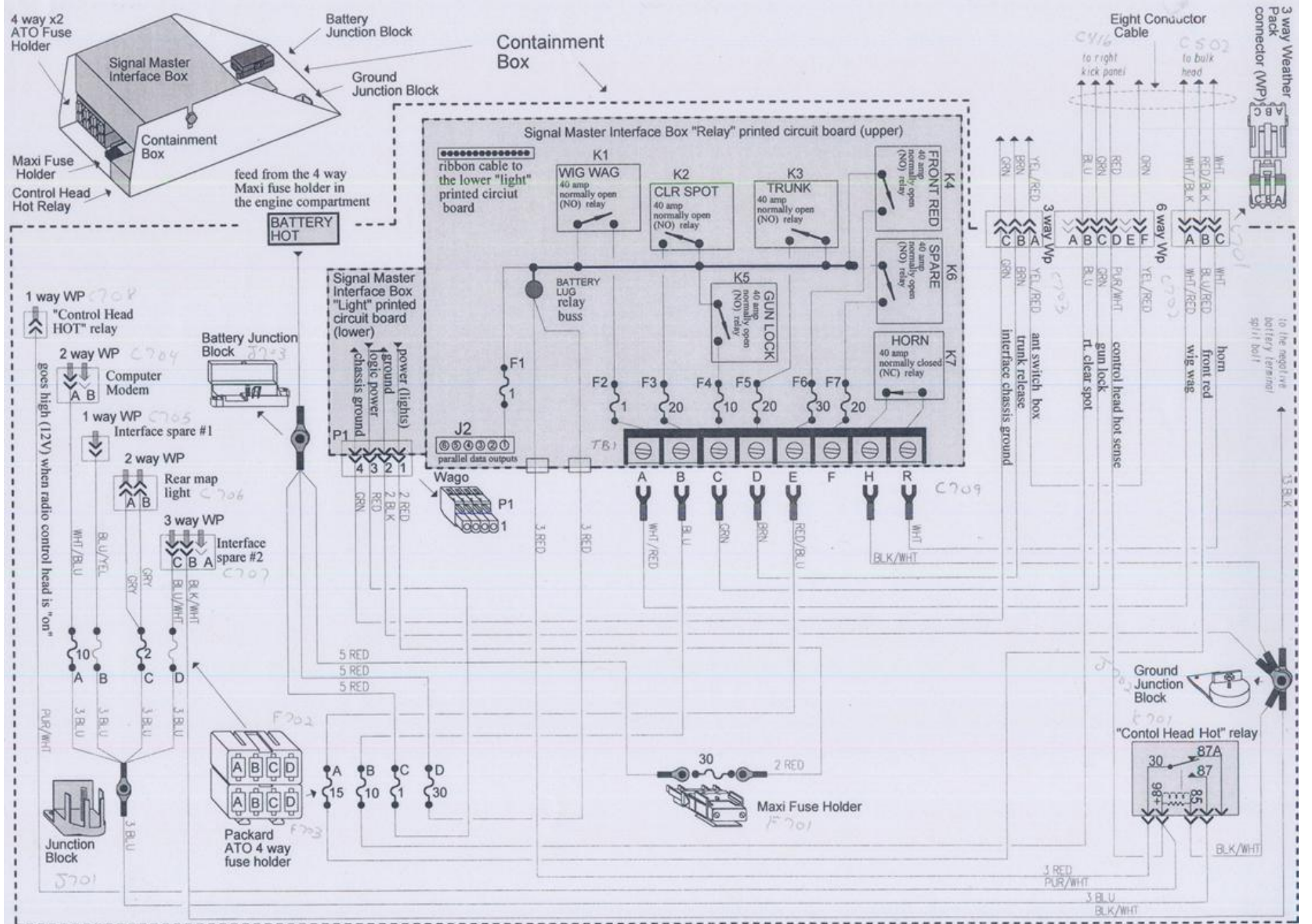


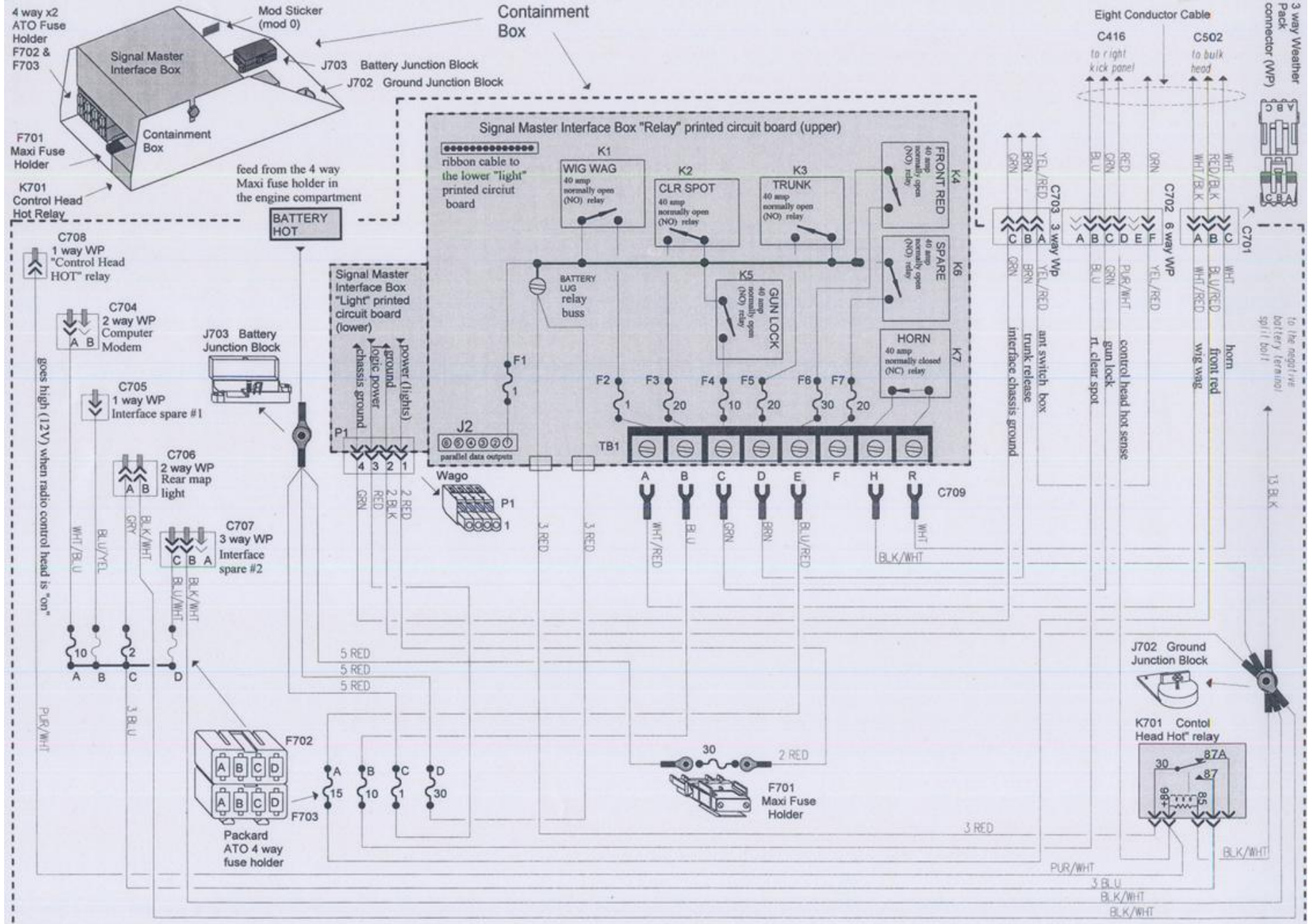
CONTAINMENT BOX

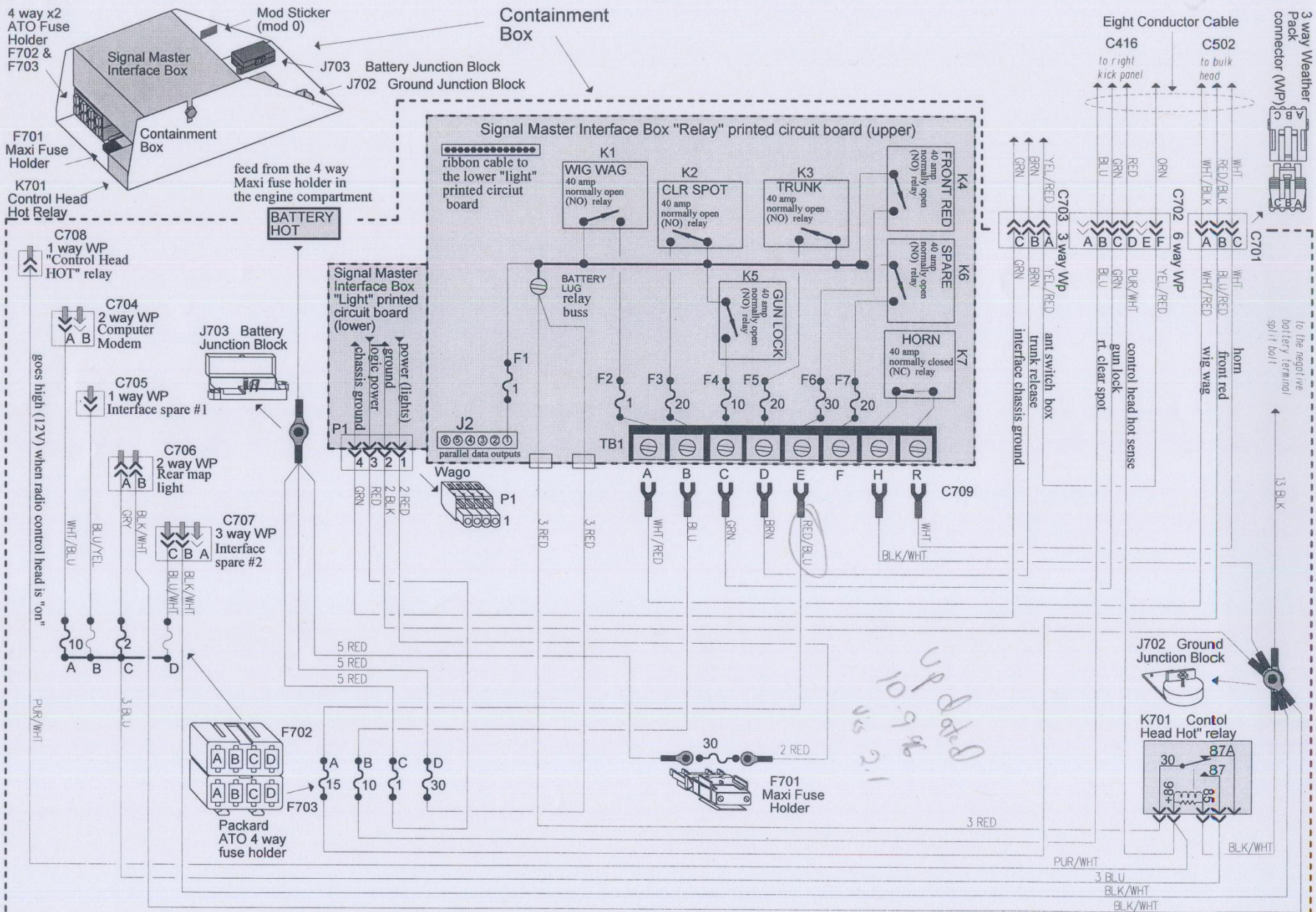


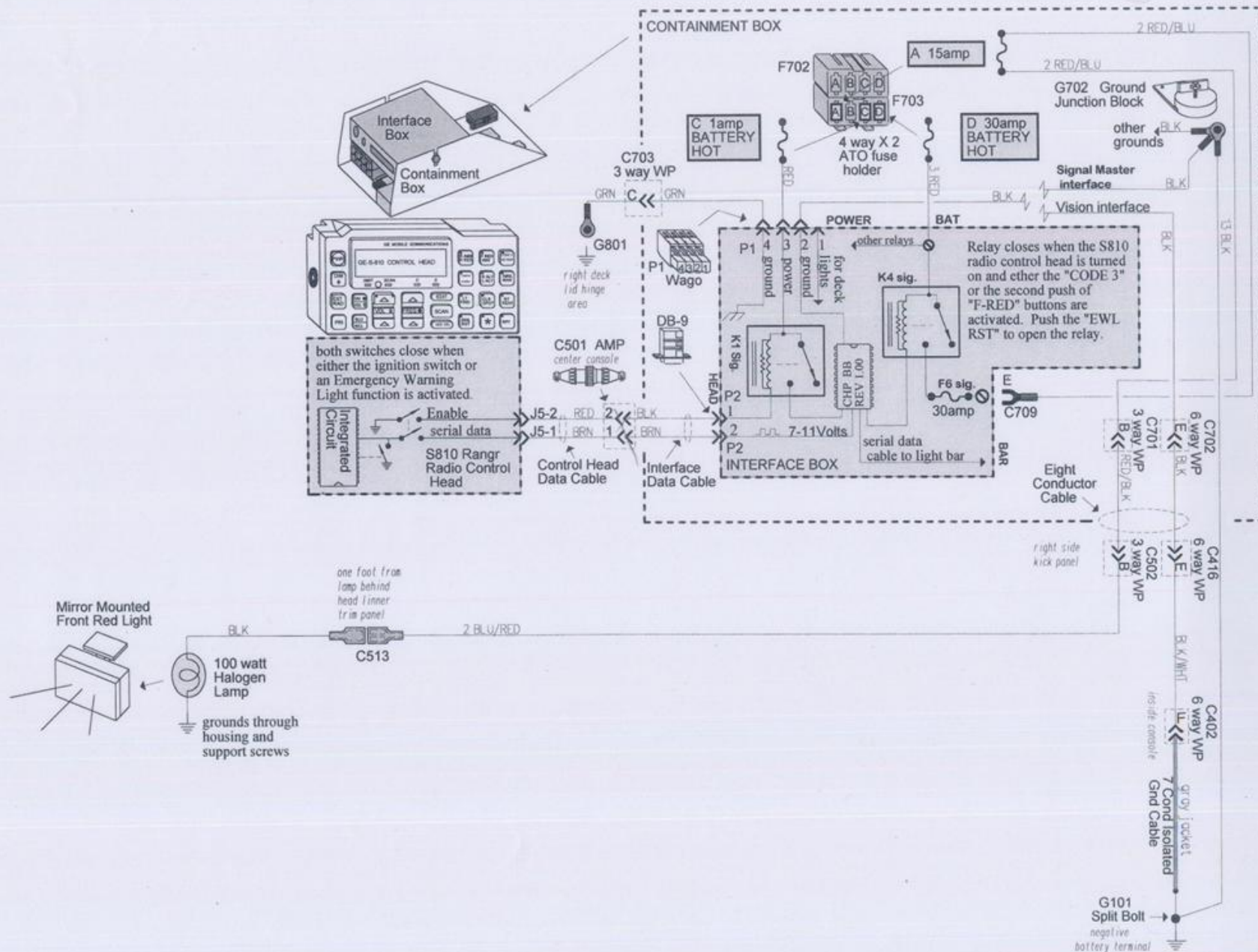


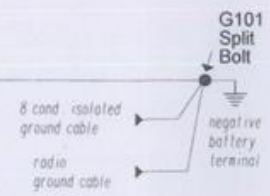
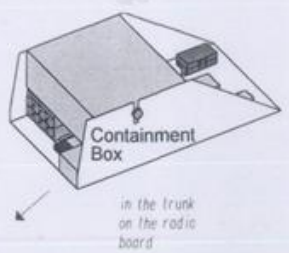
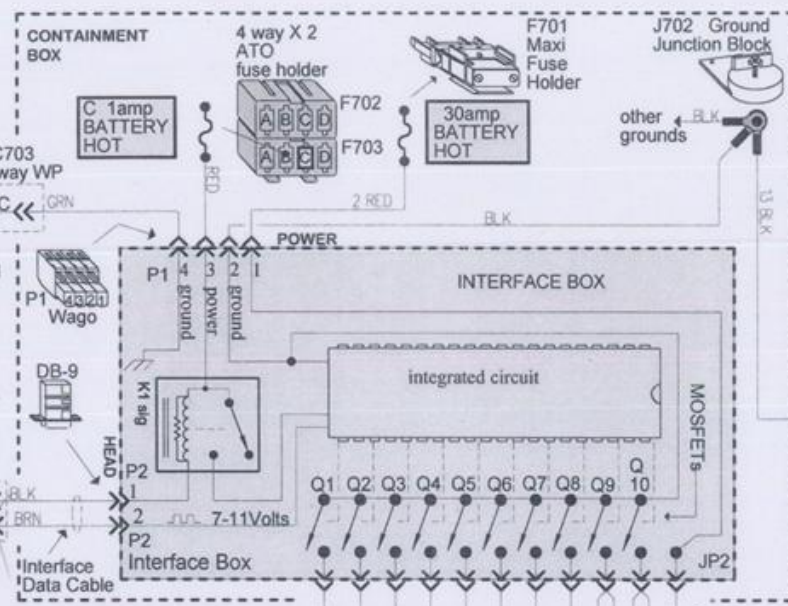
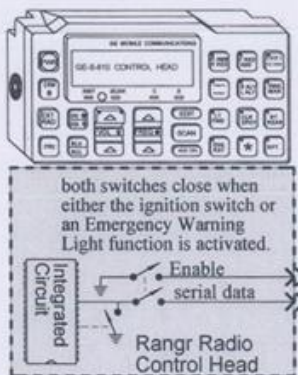
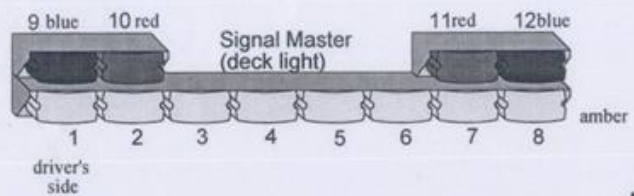




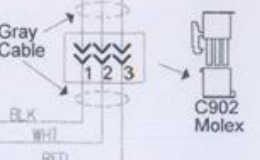
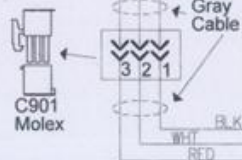
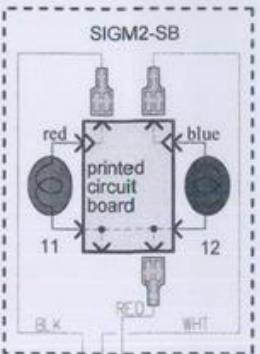
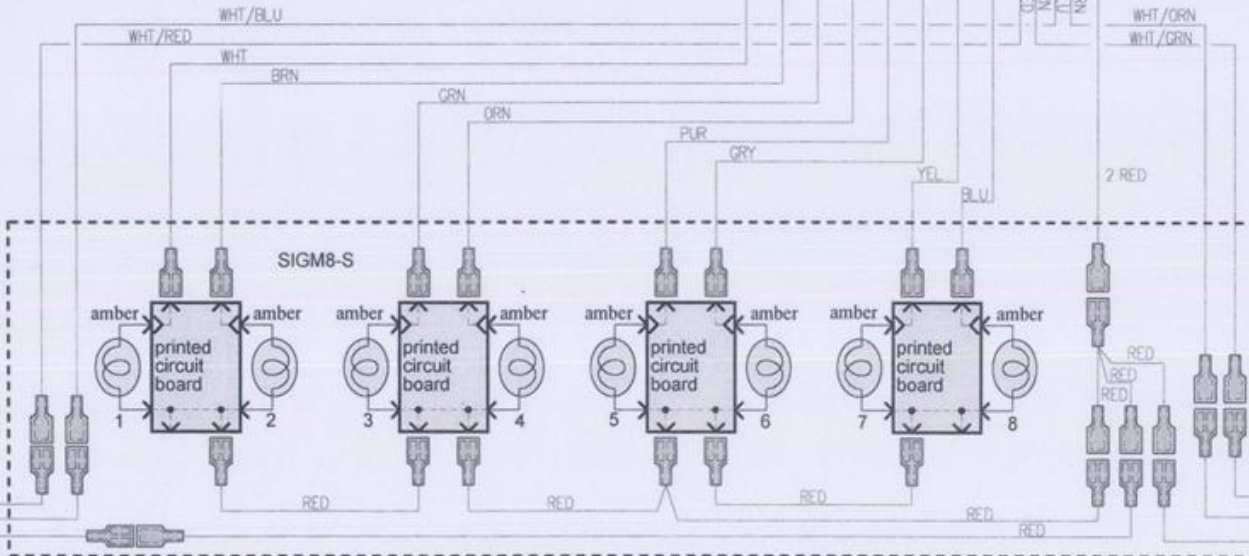
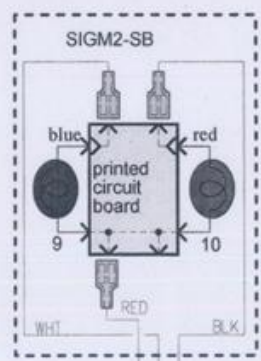
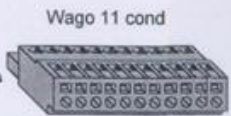




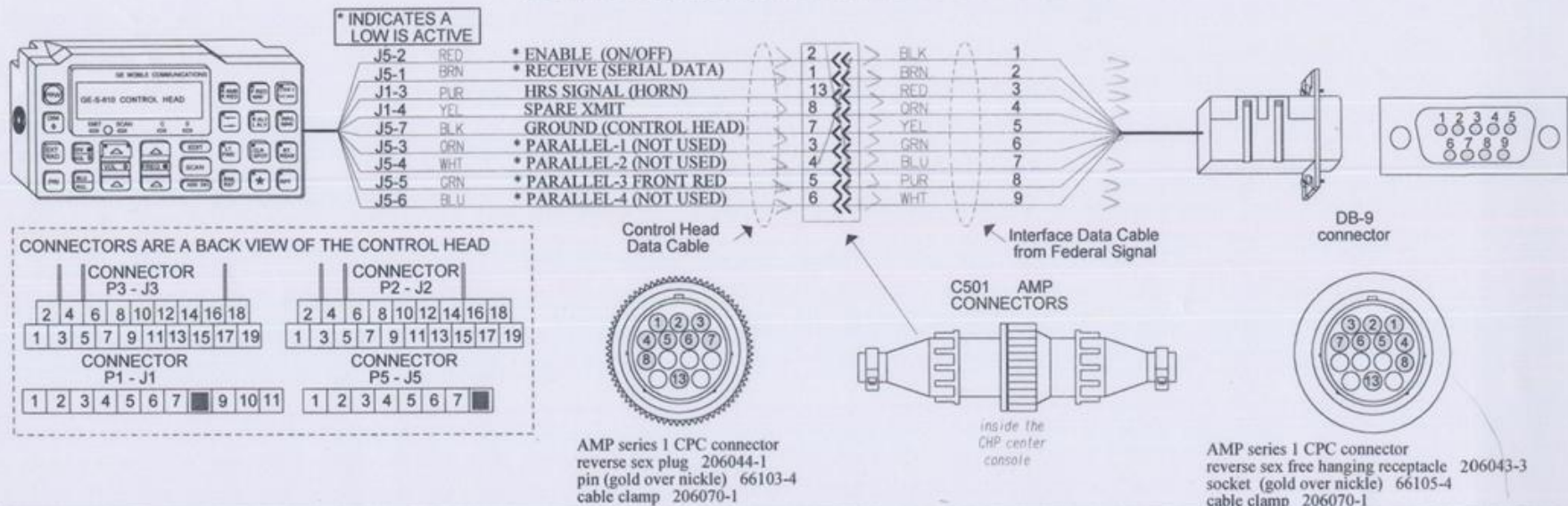




BLK 11 cond. Cable

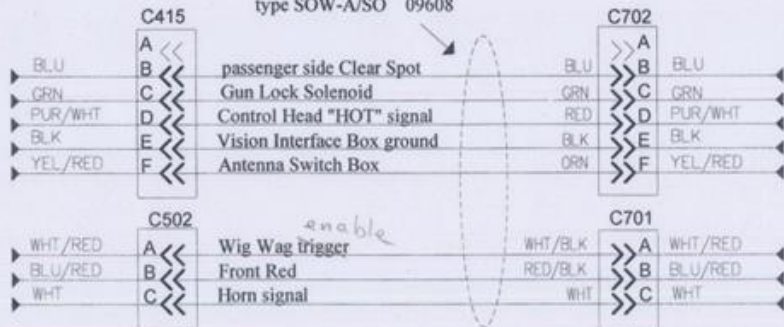


CONTROL HEAD and INTERFACE DATA CABLES

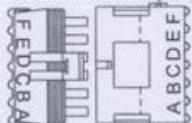


EIGHT CONDUCTOR CABLE

Carol Wire Super Vu-Tron type SOW-A/SO 09608

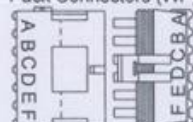


6 way Pioneer Weather Pack Connectors (WP)



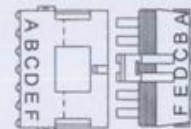
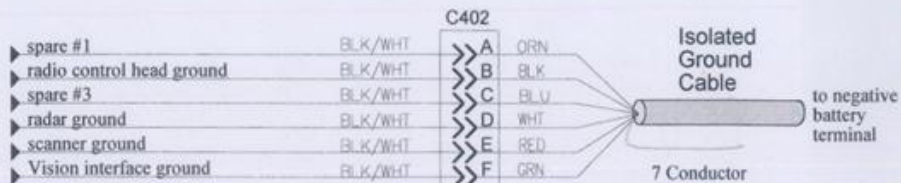
left side front kick panel

6 way Pioneer Weather Pack Connectors (WP)



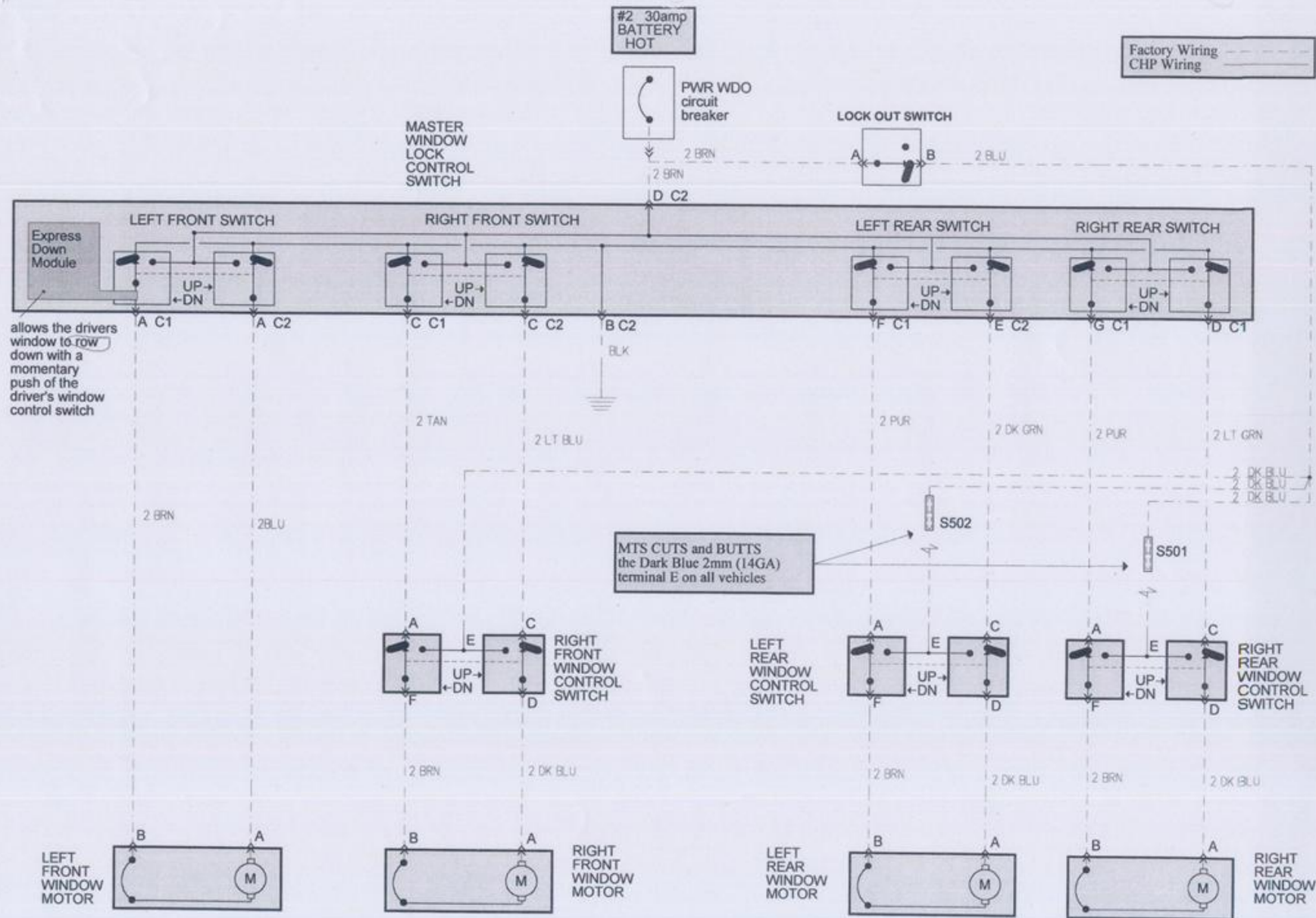
in Containment Box in the trunk

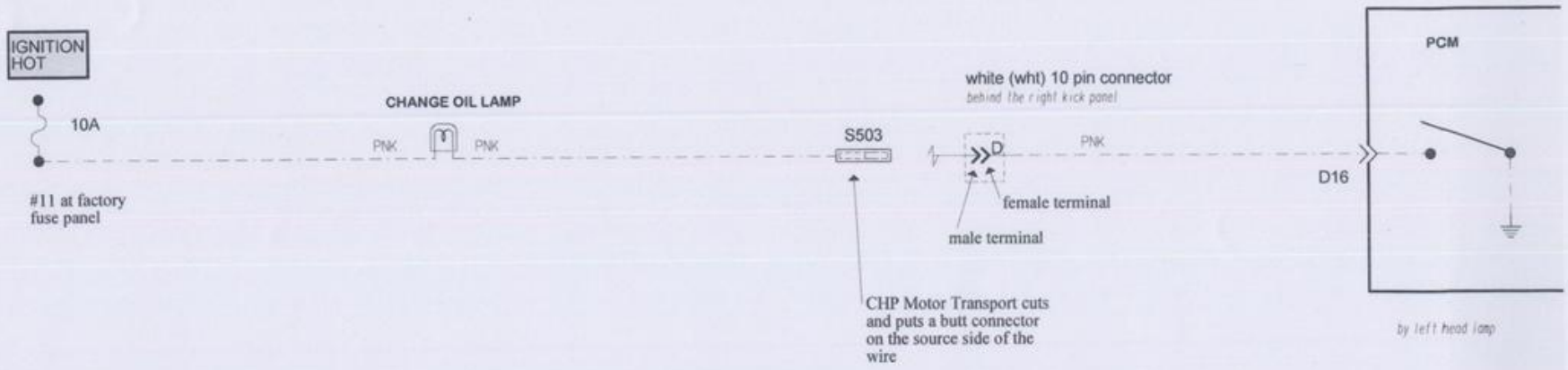
SIX CONDUCTOR ISOLATED GROUND CABLE



6 way Pioneer Weather Pack Connectors (WP)

inside the CHP center console





Any CHP owned and operated 1994 Chevrolet Caprice vehicles built at Motor Transport after 1-8-95 will have the "CHANGE OIL LAMP CIRCUIT" disconnected.

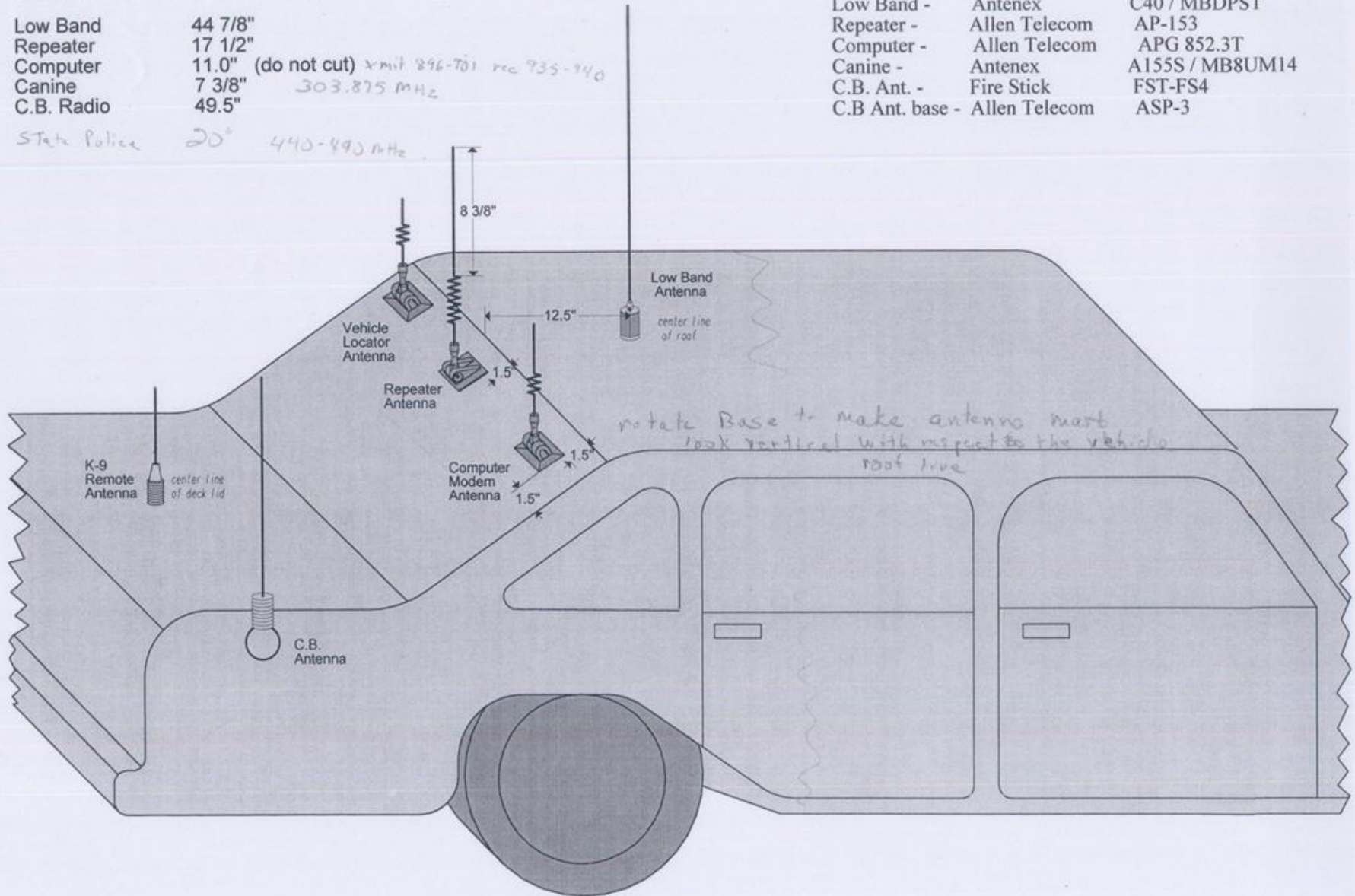
Factory Wiring - - - - -
 CHP Wiring —————

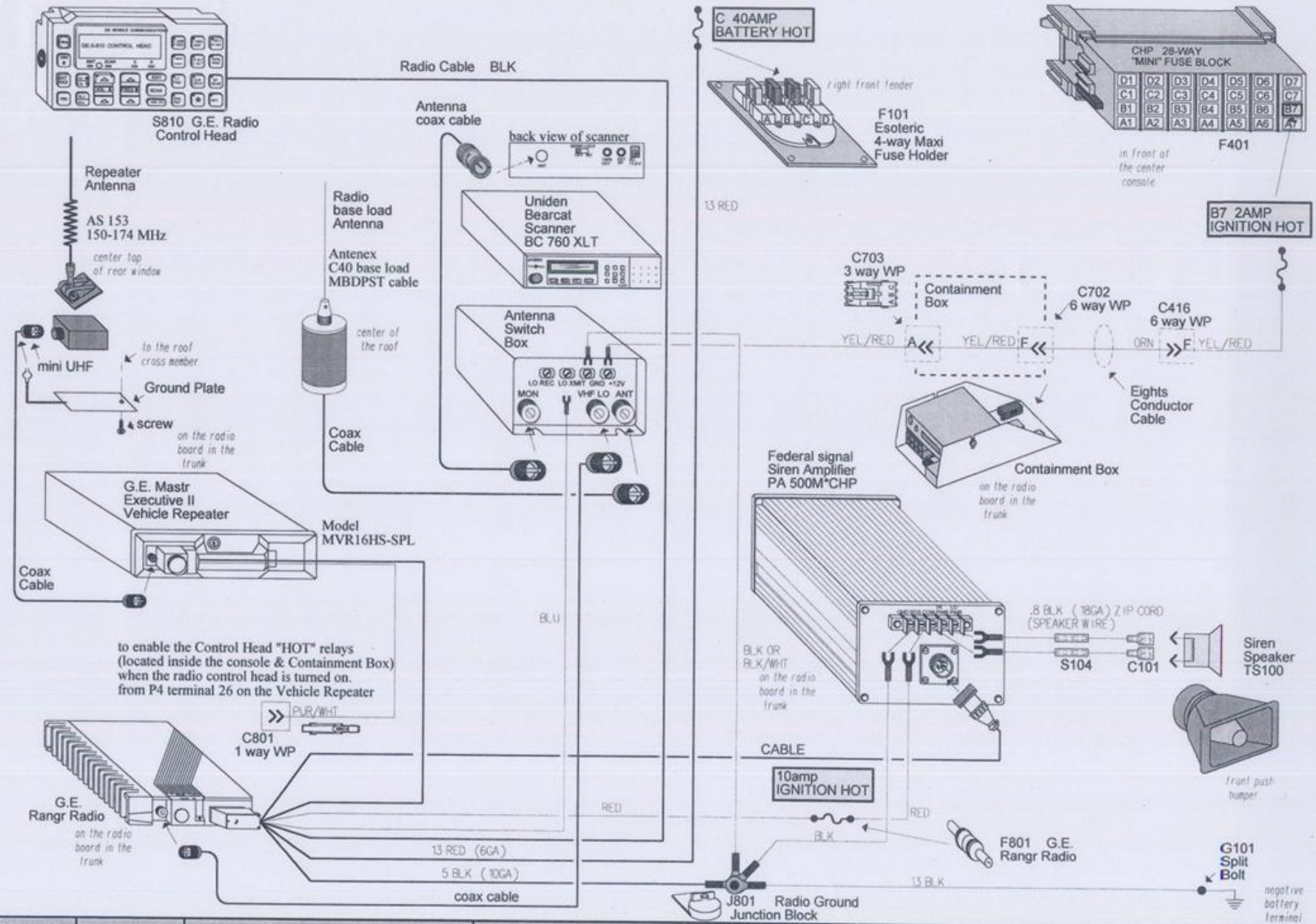
Approximate Over All Antenna Lengths

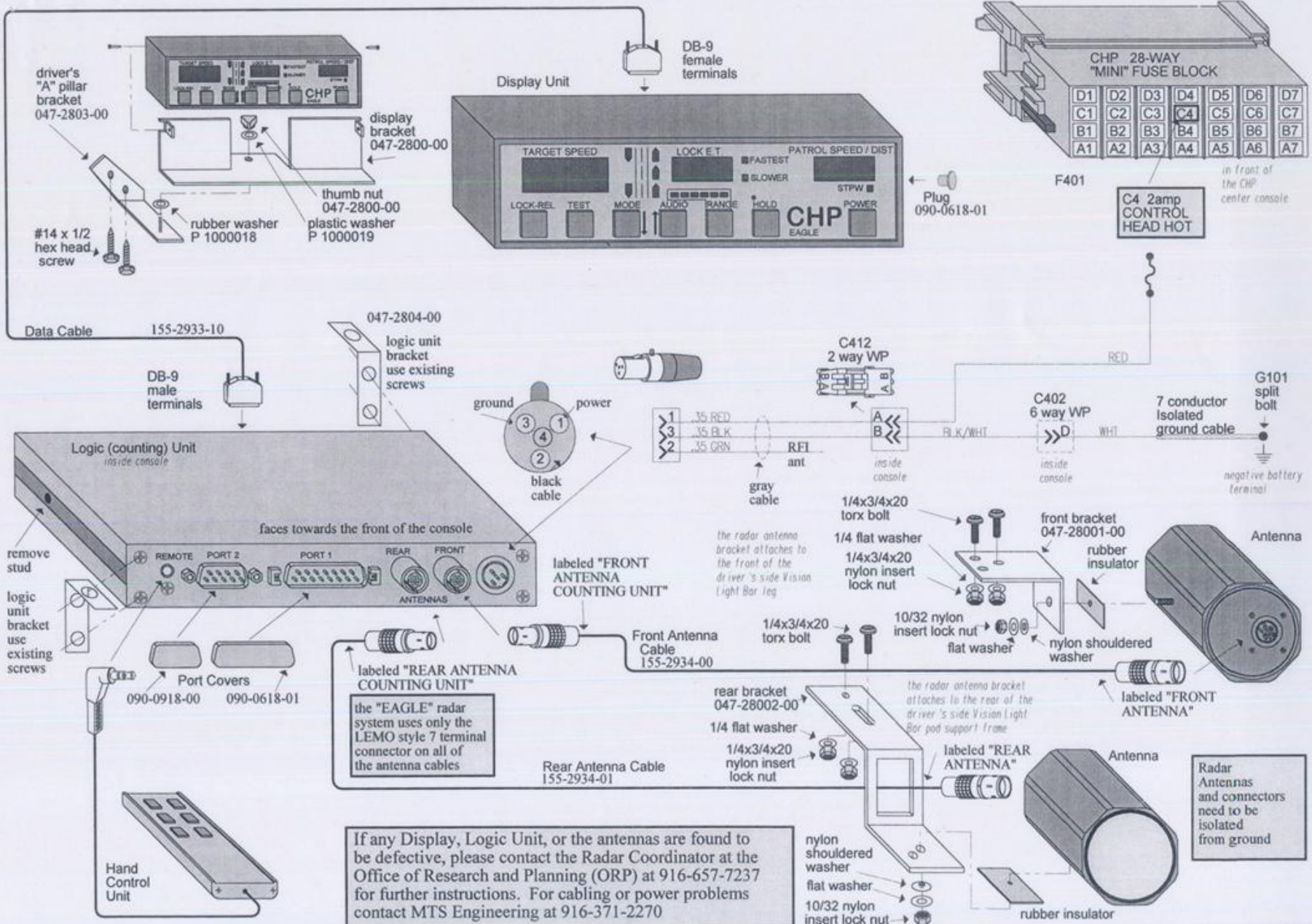
Low Band	44 7/8"	
Repeater	17 1/2"	
Computer	11.0"	(do not cut) xmit 896-701 rec 935-940
Canine	7 3/8"	303.875 MHz
C.B. Radio	49.5"	

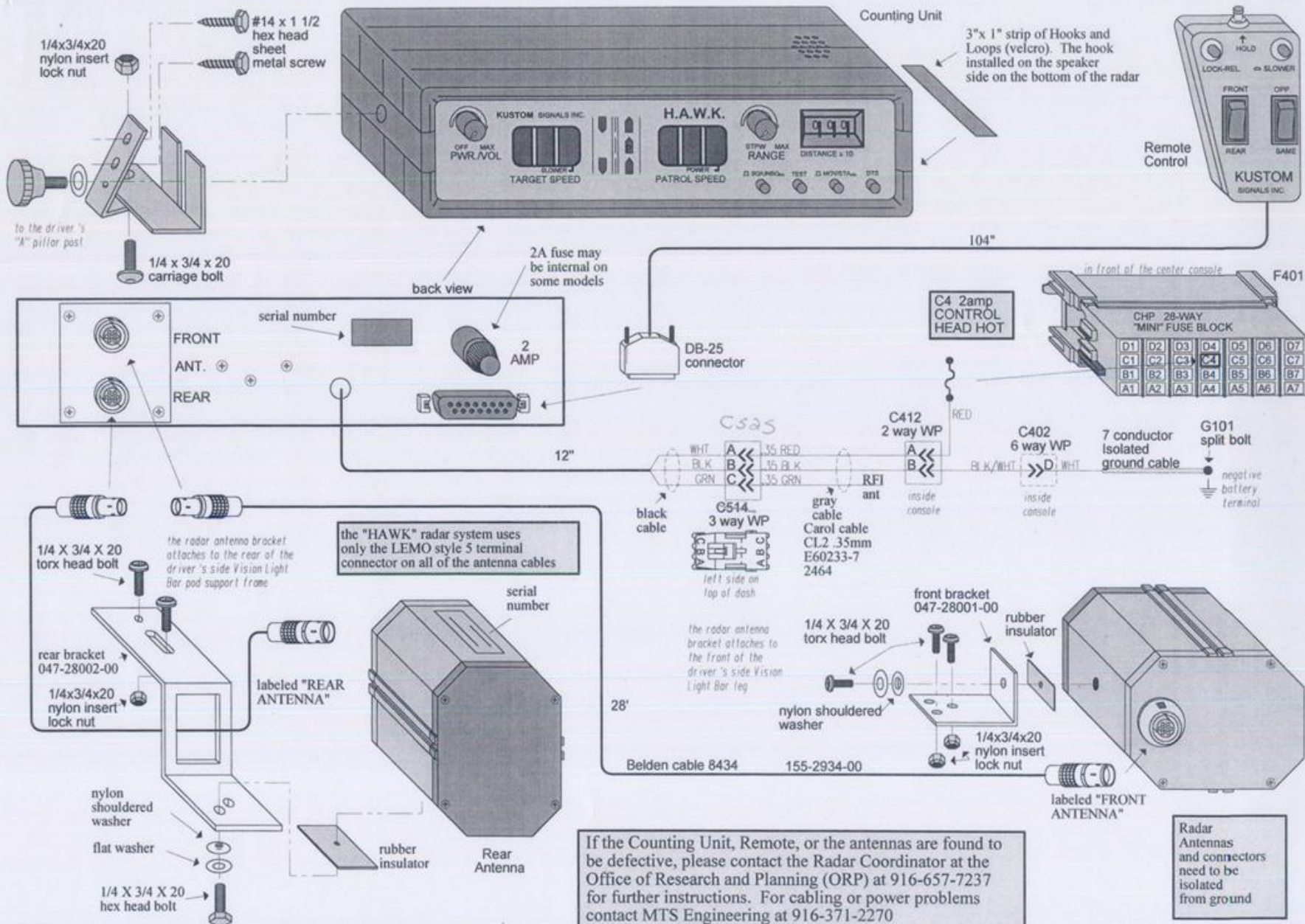
State Police 20° 440-490 MHz

Low Band -	Antenex	C40 / MBDPST
Repeater -	Allen Telecom	AP-153
Computer -	Allen Telecom	APG 852.3T
Canine -	Antenex	A155S / MB8UM14
C.B. Ant. -	Fire Stick	FST-FS4
C.B. Ant. base -	Allen Telecom	ASP-3









COMPONENT OPERATION INFORMATION

CHANGE OIL WARNING LAMP: Chevrolet installed this circuitry in all their Caprice vehicles as a reminder to the general public to change the engine oil. The Powertrain Control Module (PCM) monitors the distance the vehicle has traveled, the Engine Coolant Temperature (ECT) and engine RPM to determine when the next service interval is required. The PCM also estimates engine oil temperature based on various inputs. Once these calibrated values are attained the PCM will ground terminal D16 and the "CHANGE OIL" lamp in the instrument cluster will illuminate. The maximum mileage that can be accumulated before the PCM illuminates the "CHANGE OIL" lamp is 7500 miles. However, the lamp may come "ON" sooner depending on engine load and temperature (trailer towing, high ambient temperatures, etc.). The lamp can be reset by cycling the accelerator pedal from closed throttle to Wide Open Throttle (WOT) 3 times within 5 seconds with the ignition key "ON" and the engine "OFF". The California Highway Patrol has an approved oil change interval, which will allow the lamp to be disabled, the disabling will be done at Motor Transport during the emergency equipment installation process starting on 1/18/95. However, disabling the "CHANGE OIL" lamp circuit will set a diagnostic trouble code (DTC) 95. The DTC 95 will set when the PCM detects wrong voltage potential for 26 seconds on terminal D16 of the PCM. The DTC will be stored in the PCM memory but will **NOT** turn "ON" the Malfunction Indicator Lamp (MIL). All field and service personnel should disregard DTC 95 when working on the PCM circuitry.

SPEEDOMETER DISPLAY ILLUMINATION BLANKING: Chevrolet has installed in all their standard "Police Package" vehicles a SPEEDOMETER DISPLAY ILLUMINATION BLANKING feature which can be used in surveillance modes to eliminate unwanted back lighting of the driver and vehicle contents. To blank the speedometer display depress the "Bulb OFF" switch located just below the center right air vent duct. To illuminate the speedometer display depress the switch again. Then the Head Light Switch is turned "ON" the SPEEDOMETER DISPLAY BLANKING circuit will be overridden.

HORN CIRCUIT: When the horn relay (K-7 for the SIGNAL MASTER deck lights or K-5 for the VISION roof lights inside the interface box) is at rest (not activated) the CHP horn relay armature coil is grounded through the "H" (black wire) terminal of the Interface box. Then when the horn contacts at the steering wheel are closed, current will be sent out from the factory's horn relay (blue wire) to our CHP horn relay feed wire (blue/red). Which will close the contacts of our horn relay allowing the factory horns to sound.

When the "CODE-3" button or the second push of the "F-RED" button are activated, the K-7, or K-5 relay inside the interface box will switch from the "H" terminal contact to the "HRS" (horn return signal) terminal contact as requested from the data line. At this point when the horn contacts are closed at the steering wheel, the 12 volts will not be sent to ground through the "H" terminal but instead sent out the "hrs" terminal to the radio control head via hard wire (red wire of the Interface data line cable then purple wire of the control head data line cable). With the radio control head horn signal circuit being of high impedance there will not be enough current flow through the CHP horn relay armature coil to activate it. But the 12 volts will be enough to tell the control head that the steering wheel horn contacts have been closed and that it can activate the siren.

ALTERNATE HEAD LIGHT FLASHER (WIG WAG): To activate the alternating head light flasher (wig wag) through the GE radio control head either use the first push of "CODE-3" or second push of "F-RED" to activate K-1 relay inside the Interface box. This will send 12 volts out of terminal "A" of the Interface box to the red (enable) wire of the wig wag unit. With 12 volts on the Enable lead (white/red wire) the wig wag will alternately send out 12 volts on the blue (left high beam head lamp) and yellow (right high beam head lamp) wires at a frequency of 1 to 2 Hertz. If there is an input of 12 volts on the wig wag's

COMPONENT OPERATION INFORMATION continued

blue wire from the left high beam head lamp (indicating the driver has activated the vehicles high beam circuit) the wig wag unit will then send out a constant 12 volts on the yellow wire only, to activate just the right side head lamp (the left side is all ready turned on by the factory head light switch) and at the same time the wig wag will disable the alternating flash operation. The wig wag operates only on the high beam circuit. All other lighting circuits are not affected by the wig wag unit.

GUN LOCK: There are two ways to activate the gun lock. The primary way is from the General Electric Radio Control Head. The ignition key needs to be on, and then you have to push the "*" (asterisk) and the "WAIL/MAN" buttons in sequence, which then sends serial data to the Interface Box, activating the gun lock relay K-3 (Vision light bar) or K-5 (Signal Master deck lights), This will apply an output of 12 volts through a 10 amp fuse to terminal "C" to the gun lock solenoid and warning alarm for about eight seconds. The secondary or back up way is to also have the ignition key on, then momentarily push either the right dash, left dash or driver's floor switches, this will put 12 volts on the enable line (pin-B yel wire) of the GUN LOCK TIMER. This will activate the timer applying 12 volts out to the gun lock terminal and pulsating piezo alarm for about eight to eleven seconds.

TRUNK RELEASE: To activate the trunk release from the GE radio control head, make sure the ignition key is in the "ON" position, then push the "*" (asterisk) and "Lt./FWD" buttons. This will send serial data to the Interface Box activating the trunk release relay K-4(Vision light bar) or K-3(Signal Master deck light) applying a output of 12 volts for 1 second through a 20 amp fuse to terminal "D" of the interface box, activating the trunk release solenoid. The trunk can also be operated through the factory trunk release switch (button) that is on the driver's side instrument panel. This switch is battery hot (A+) so the trunk can be activated at any time while in park or neutral.

CLEAR SPOT LIGHT: For **Vision roof lights** cars to activate the right side clear spot light from the GE radio control head, push the "*" (asterisk) and the "CLR/SPOT" buttons in sequence. This will, through the data line, activate the relay K-2 inside the INTERFACE BOX, sending 12 volts through a 20 amp fuse and out terminal "B" to the 10amp fuse in the 4-way fuse folder that is located next to the Interface Box. From there the current goes through the eight conductor cable to the right hand side spot light. The second fuse was installed so when the spot light circuit over loads (example: spot light handle loosens up) the 10 amp fuse should blow first which is easily replaced instead of opening up the Interface Box to replace the 20 amp fuse. To shut off press the sequence again or use the "*" (asterisk) then "EWL" (emergency warning light) buttons. For the **Signal Master deck lights** cars you only need to push the "CLR/SPOT" (clear spot) button which will then, through the data line, activate the relay K-2 inside the INTERFACE BOX. This will send 12 volts through a 20 amp fuse and out terminal "B" to the 4-way fuse folder that is located next to the Interface Box. From there the current goes through a 10 amp fuse and to the right hand side spot light. The second fuse was installed so when the spot light circuit over loads (example: spot light handle loosens up) the 10 amp fuse should blow first which is easily replaced instead of opening up the Interface Box to replace the 20 amp fuse. To shut off press the "CLR/SPOT" (clear spot) button again or use "*" (asterisk) then "EWL" (emergency warning light) buttons. The pressing of the "*" then the "CLR/SPOT" buttons will activate K-6 a spare relay which is not used in this car at this time.

FRONT RED SPOT OR FRONT RED MIRROR MOUNTED LIGHT ON DECK LIGHT VEHICLES: Pushing either the "CODE-3" button or the "F-RED" button on the GE radio control head will then, through the data line, activate the relay K-4 inside the INTERFACE BOX. This will send 12 volts

COMPONENT OPERATION INFORMATION continued

through a 30 amp fuse and then out terminal "E" to the 4-way fuse folder that is located next to the Interface Box. From there the current goes through a 15 amp fuse and then to the red light. The second fuse was installed so when the spot light circuit over loads (example: spot light handle loosens up) the 15 amp fuse should blow first, which is easily replaced, instead of opening up the Interface Box to replace the 30 amp fuse. To shut off press the "EWL" (emergency warning light) button, or press the "*" (asterisk) and "EWL" (emergency warning light) buttons in sequence.

Warning light operational sequence: Use the "FIELD OPERATION CARD" booklet that is supplied with every vehicle for further information: SIGNAL MASTER DECK LIGHT, form number 501S from Supply Services with part number 0-501-19. and VISION LIGHT BAR, form number 501V from Supply Services with part number 0-501-22

THEORY OF OPERATION FOR THE VISION LIGHT BAR: The Vision Emergency Light System consists of three major sub assemblies; The GE radio control head, the Interface Box, and the Light Bar. A microprocessor in each assembly (3 total), controls the operation of the subassemblies and sends/receives commands and status information to/from the other subassemblies.

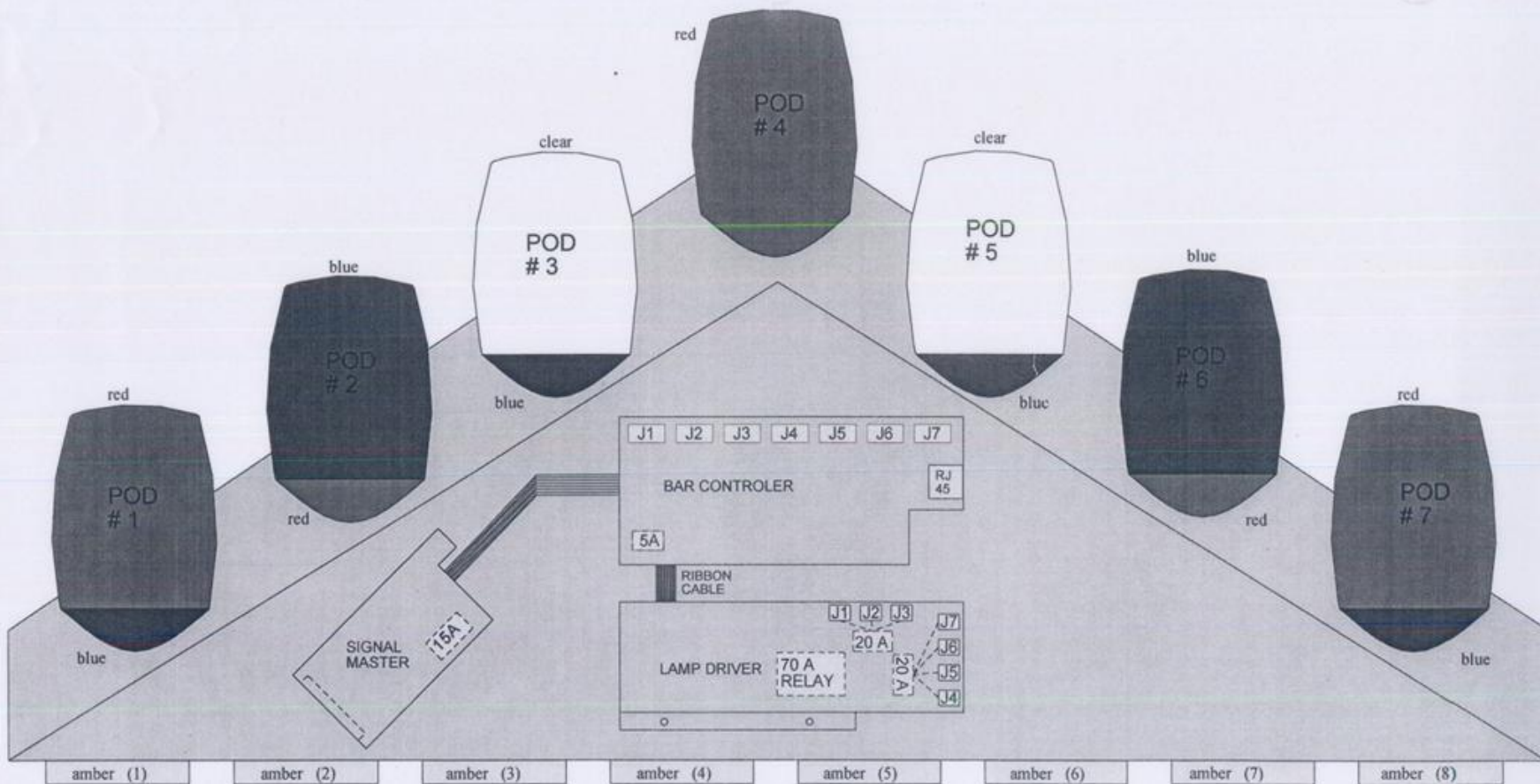
Interface Box: The microprocessor, within the Interface Box, contains the intelligence or the "smarts" required to interpret the operator commands, make decisions based upon user program selections, save these program selections in a special non-volatile (no power required) memory, send commands to activate the Light Bar and other auxiliary relays and in general acts as the "control center" for the entire system.

Light Bar: The Light Bar includes seven "pods" (light Modules) with lamps (4 amp 50 watt halogen) and motors, eight directional signal lights (2 amp 27 watt halogen), a Bar Controller pc (printed circuit) board, a Lamp Driver pc board, and a Signal Master pc board. The Light Bar receives commands from the Interface Box via the RJ-45 data cable and acts upon those commands. This causes the pods and or the Signal Master (directional signal) to execute one of many patterns stored within the microprocessor (Bar Controller) of the Light Bar. The Light Bar will return signals to the Interface Box to indicate receipt of those commands and in general to inform the Interface Box of the Light Bar status.

Bar Controller: A printed circuit board that controls the sequence of the lamps and the sequence and operation of the motors as directed by the Interface Box. The Bar Controller has a microprocessor which provides the intelligence or "smarts" of the light bar. This intelligence gives the bar the ability to execute all of the light patterns the Vision can perform. The Interface Box merely tells the Bar Controller which pattern to perform.

Lamp Driver: A printed circuit board that provides the solid state switches (enhanced metal oxide semiconductor field effect transistor or E-MOSFET) which turn the lamps on or off by control signals from the Bar Controller, again as directed by the Interface Box. The operation of the lamps are of a controlled ground type (the lamps are feed 12 volts and the Lamp Driver controls the ground circuit to activate the lamp).

Signal Master: A printed circuit board that provides the solid state switches for the lamps of the Signal Master. This operation is also of the ground control type.



FEDERAL SIGNALS "VISION" LIGHT BAR

◆ WARNING THE VISION LIGHT BAR SYSTEM CONTAINS ELECTROSTATIC SENSITIVE COMPONENTS

For diagnostic help or any questions contact Motor Transport Engineering Section.

All Federal Signal's Vision Light Bar and Signal Master Deck Lights parts (except bulbs and fuses) are on warranty for 10 (ten) years. All parts, excluding bulbs and fuses (Supply Services have them), are available through Motor Transport Engineering Section. Parts can be acquired by sending a CAL-NET message. The message needs to include: Year, Make, Model, Vehicle number, Mileage, Name of the part needed, and Description of the defect. B.O. is not a proper description. No output of terminal "A" of the Interface Box in "CODE-3" mode, would be a proper description so that the manufacturer and or Motor Transport can properly analyze and repair the defective part.

When the new part arrives there will be an "Broken Component Report" sheet along with it. Fill out the missing data if any then attach it to the defective part and return it to Motor Transport Section attention Engineering Unit. If an Area has not returned a part they may not get another light bar part until that outstanding part is turned in.

PROPER VOLTAGES ON A GOOD WORKING FEDERAL SIGNAL INTERFACE BOX

VOLTAGE MEASURED AT THE ORANGE CONNECTOR (P-1)

PIN 1	12V	RED	SIGNAL MASTER (LAMP FEED WIRE) NOT USED ON THE VISION LIGHT BAR
PIN 2	.0V	BLACK	GROUND
PIN 3	12V	RED	BATTERY
PIN 4	.0V	GREEN	CHASSIS GROUND

CONTROL HEAD-----ON

IGNITION KEY-----OFF

FUNCTIONS-----OFF

CONTROL HEAD-----ON

IGNITION KEY-----ON (ENGINE RUNNING)

FUNCTIONS-----CODE 3

VOLTAGE MEASURED AT THE DB-9 CONNECTOR

PIN #	VOLTAGE	FUNCTION
1	12	RELAY ENABLE (LOW)
2	.0	DATA LINE

VOLTAGE MEASURED AT THE DB-9 CONNECTOR

PIN #	VOLTAGE	FUNCTION
1	.8	RELAY ENABLE (LOW)
2	11-8 TOGGLES	DATA LINE

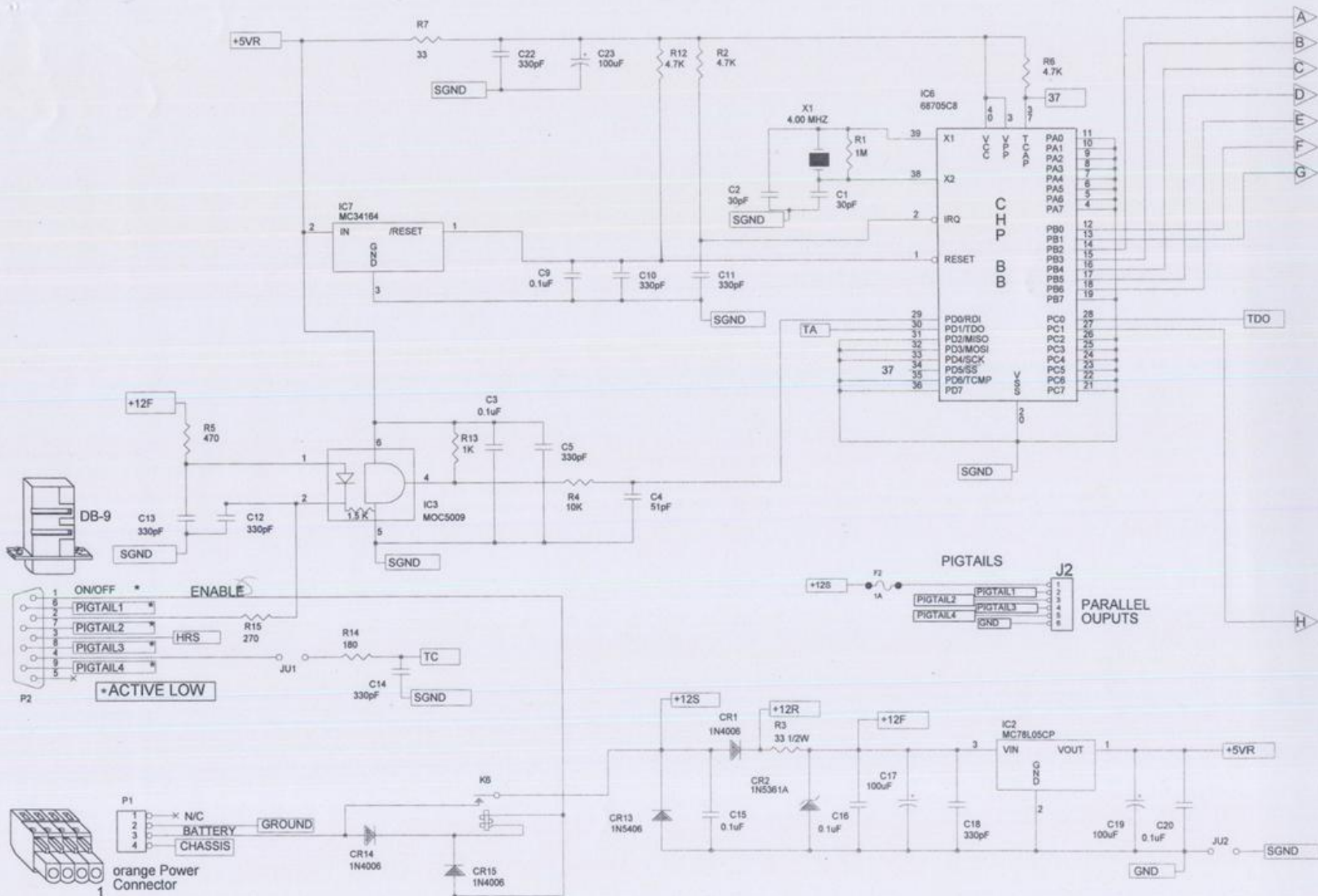
VOLTAGE MEASURED AT THE RJ-45 CONNECTOR

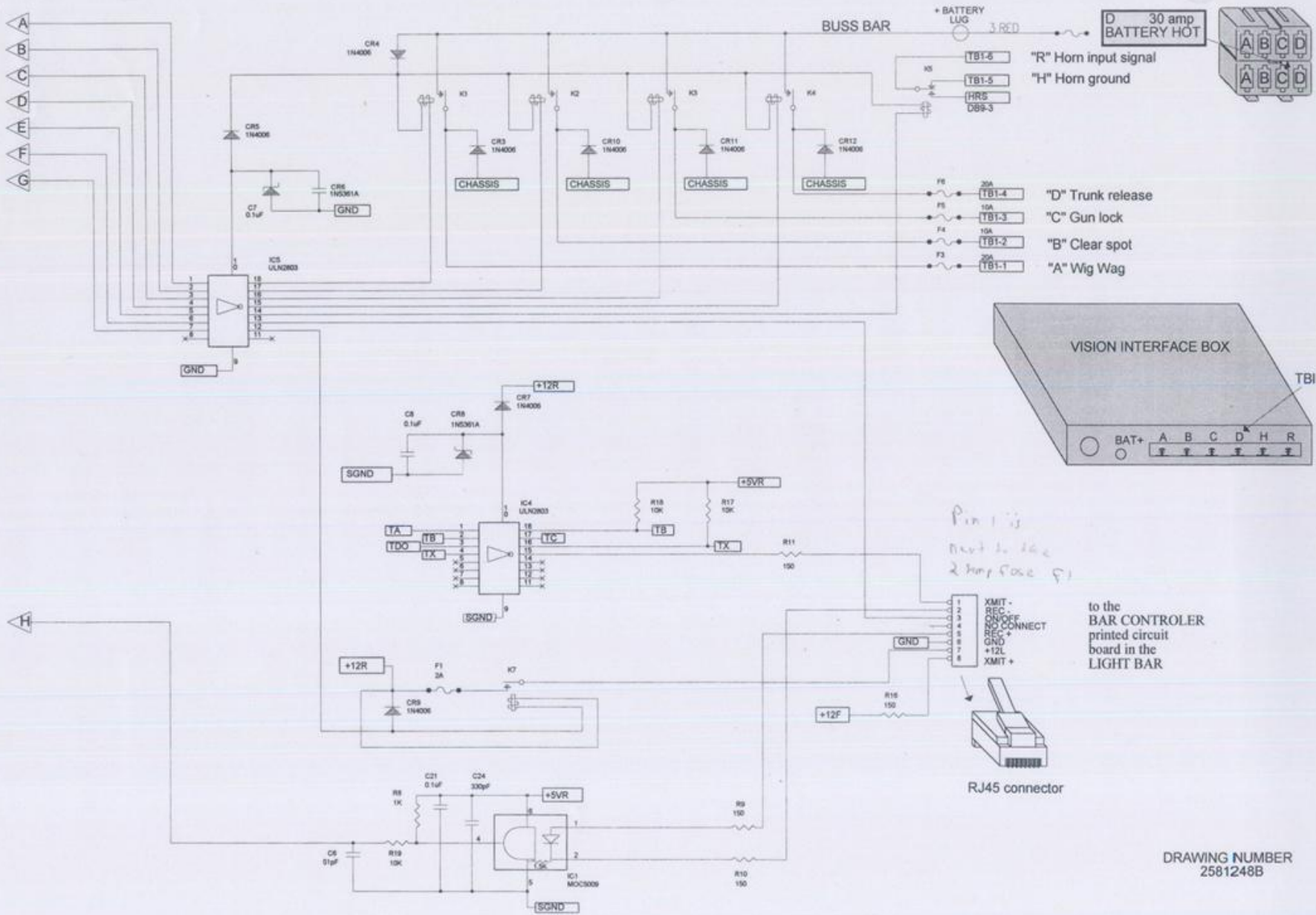
PIN #	VOLTAGE	FUNCTION
1	0	TRANSMIT (NEGATIVE)
2	0	RECEIVE (NEGATIVE)
3	12	LIGHT BAR ENABLE RELAY (LOW)
4	0	NOT USED
5	0	RECEIVE (POSITIVE)
6	0	GROUND
7	0	SWITCHED 12 VOLT
8	0	TRANSMIT (POSITIVE)

VOLTAGE MEASURED AT THE RJ-45 CONNECTOR

PIN #	VOLTAGE	FUNCTION
1	11.25	TRANSMIT (NEGATIVE)
2	8.4	RECEIVE (NEGATIVE)
3	.65	LIGHT BAR ENABLE RELAY (LOW)
4	0	NOT USED
5	9.2	RECEIVED (POSITIVE)
6	.0	GROUND
7	12	SWITCHED 12 VOLTS
8	11.87	TRANSMIT (POSITIVE)

ALL VOLTAGES ARE MEASURED AT THE INTERFACE BOX WITH ALL WIRES AND CONNECTERS HOOKED UP VOLTAGES TOLERANCE +/- 10% OF SOURCE VOLTAGE MEASURED AT THE CONTAINMENT BOX BATTERY JUNCTION BLOCK

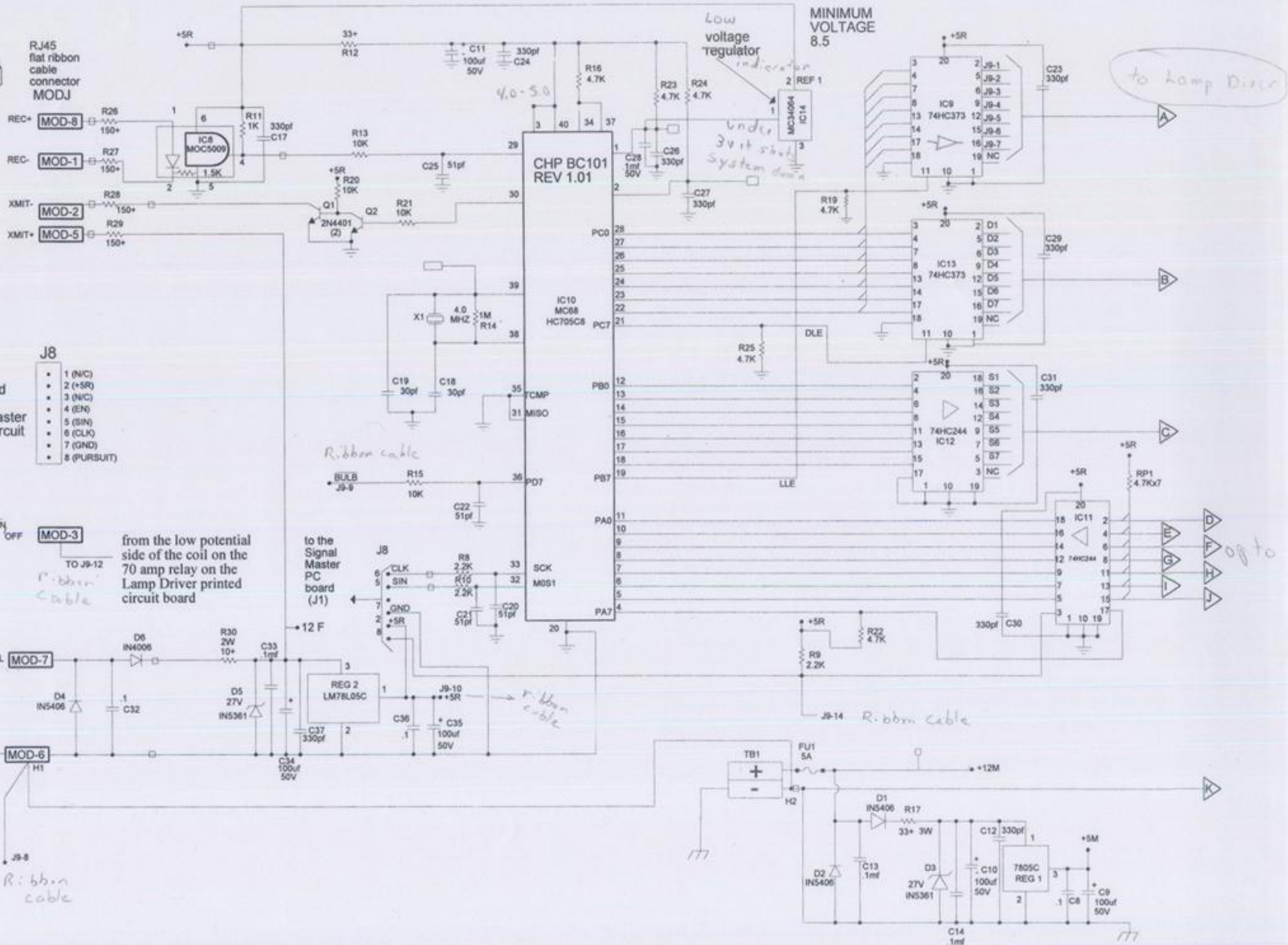




DRAWING NUMBER
2581248B



RJ45 flat ribbon cable connector MODJ

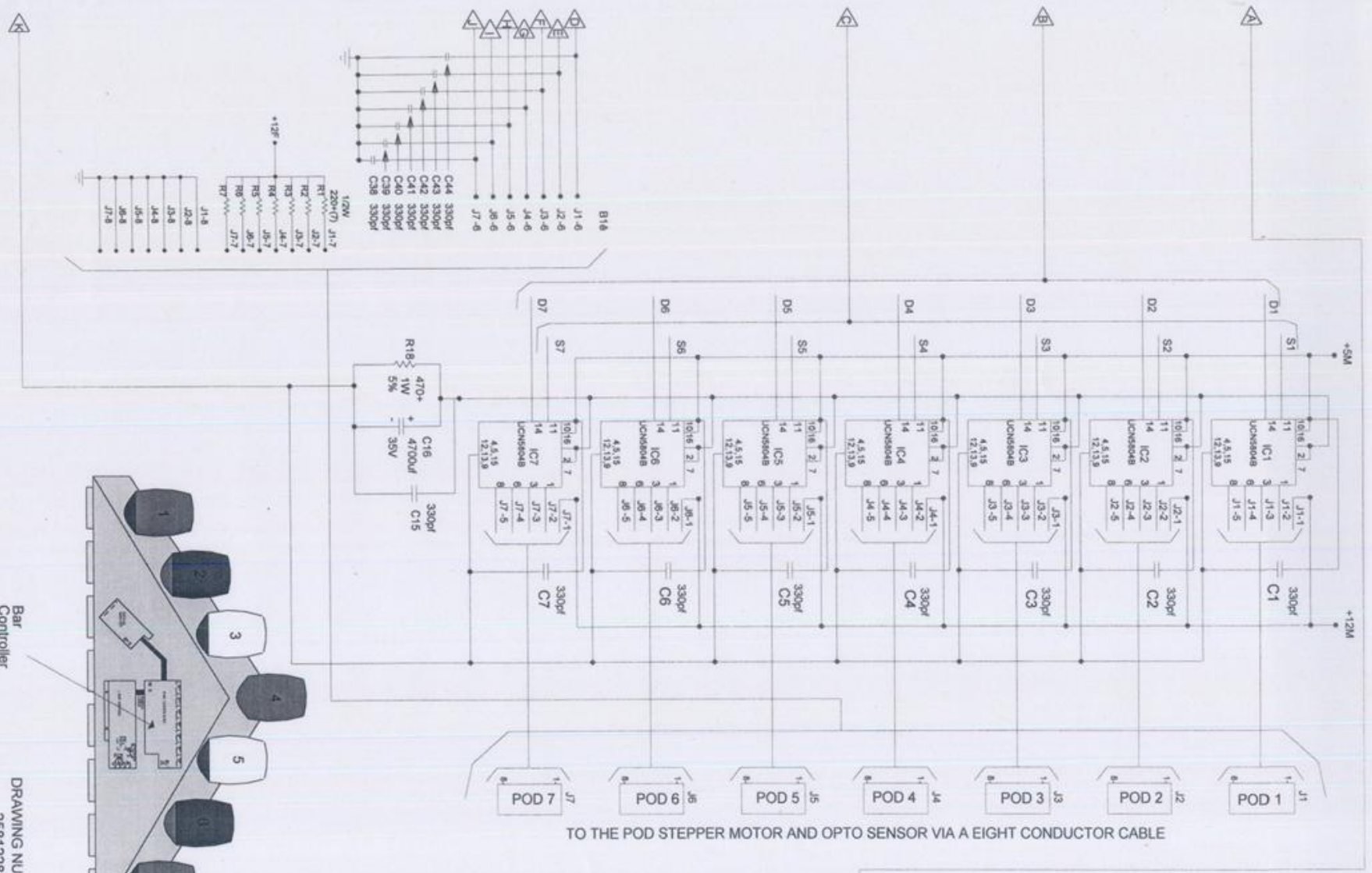


ribbon cable connected to the Signal Master printed circuit board

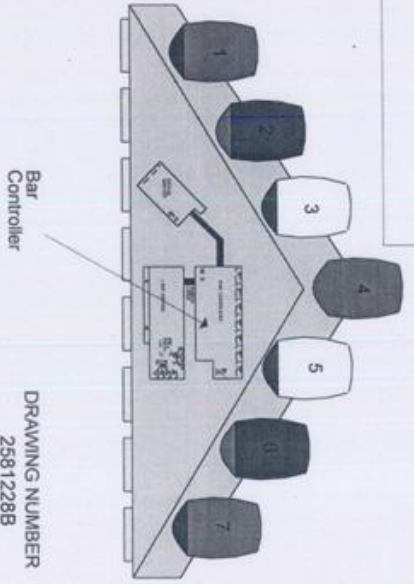
- J8
- 1 (ENC)
 - 2 (+5R)
 - 3 (ENC)
 - 4 (ENC)
 - 5 (SIN)
 - 6 (CLK)
 - 7 (GND)
 - 8 (PURSUIT)

MOD-3 from the low potential side of the coil on the 70 amp relay on the Lamp Driver printed circuit board

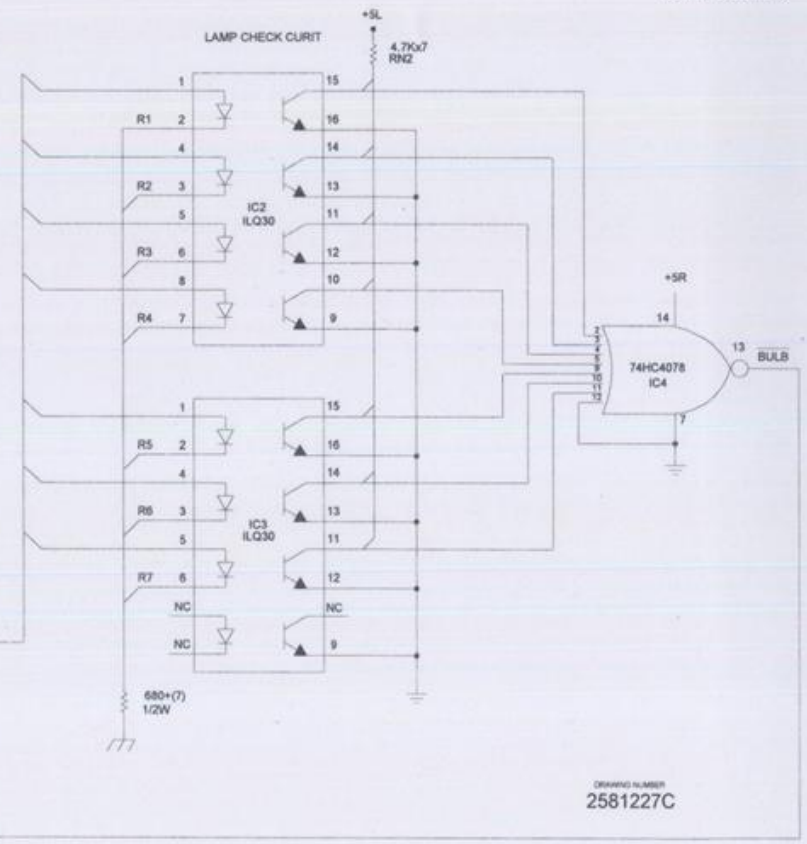
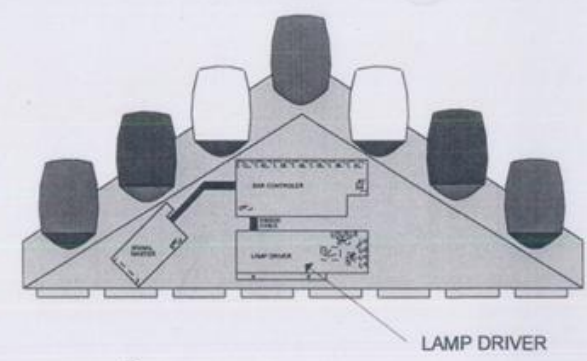
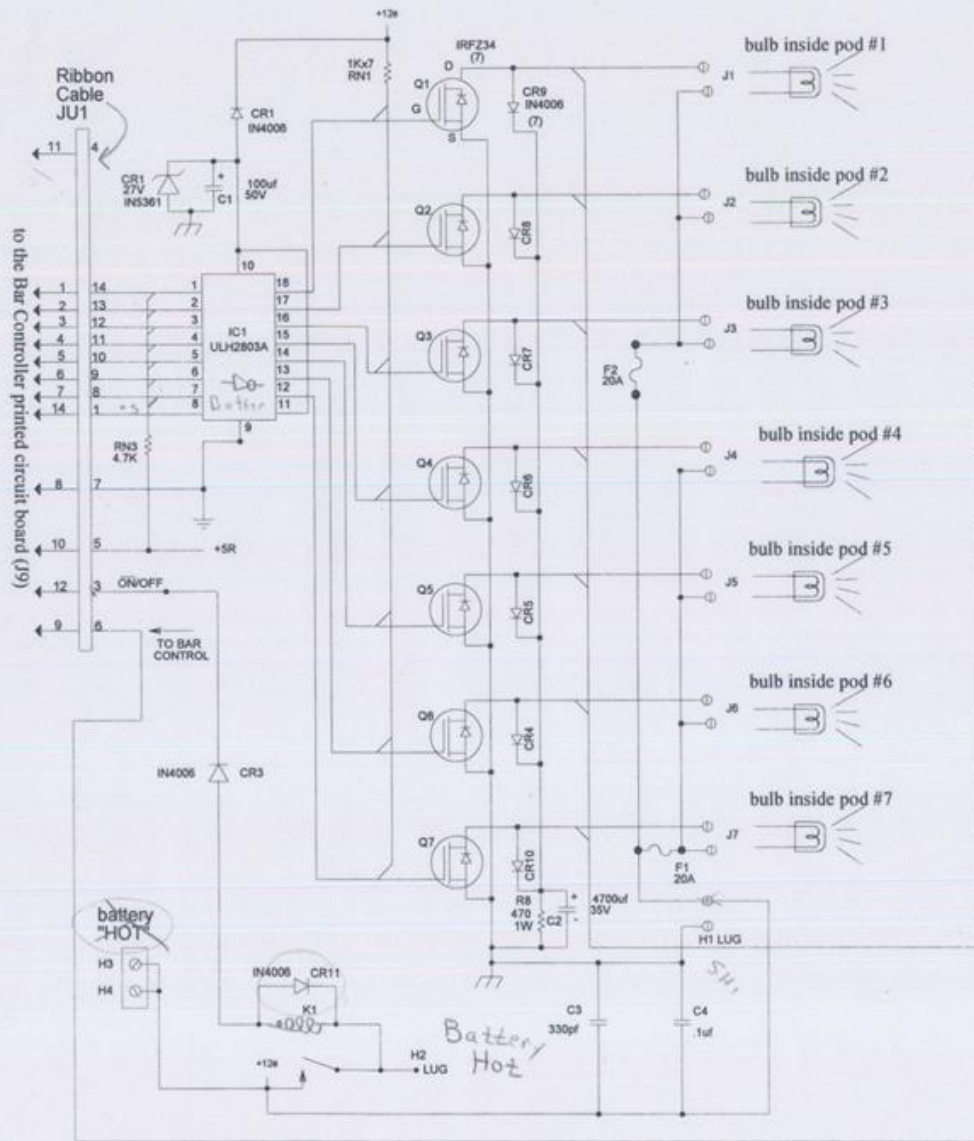
MOD-6 H1 Ribbon cable

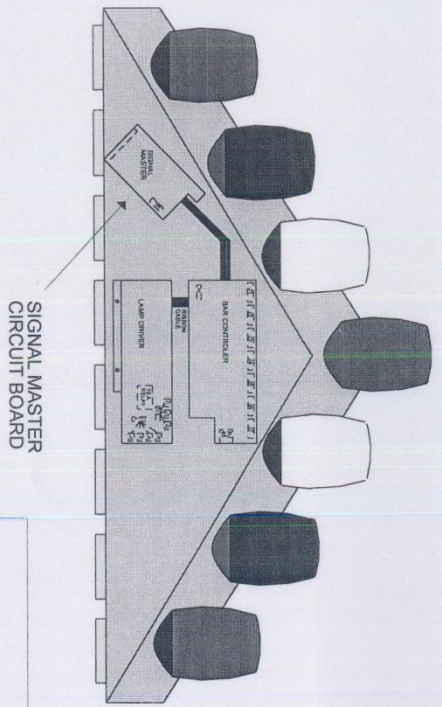


GOES TO THE LAMP
DRIVER PRINTED CIRCUIT
VIA A 14 CONDUCTOR
RIBBON CABLE



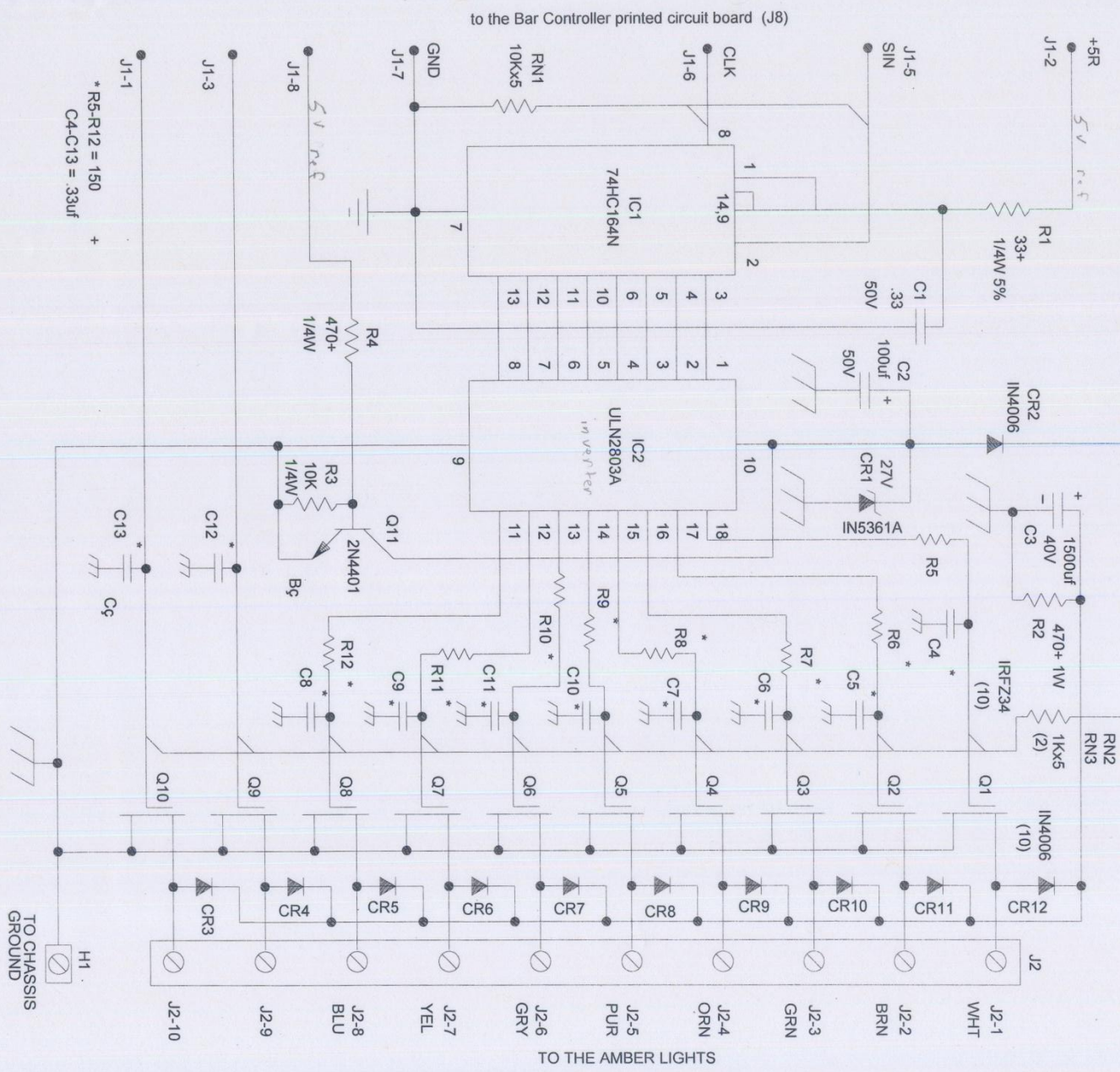
Bar Controller
DRAWING NUMBER
2581228B





DRAWING NUMBER
2581225C

"HOT" when
lamp drivers
relay closes
H2
H3
LAMP
COMMON



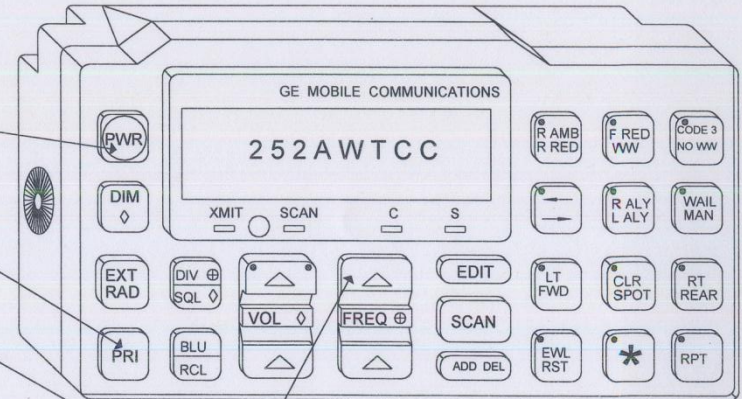
to the Bar Controller printed circuit board (J8)

TO THE AMBER LIGHTS

PERSONALITY READ OUT OF THE GENERAL ELECTRIC S-810 CONTROL HEAD

OPERATION:

- 1) PRESS THE "PWR" (POWER) BUTTON TO TURN THE CONTROL HEAD ON
- 2) PRESS THE "PRI" (PRIMARY) BUTTON
- 3) START PRESSING THE "FREQ" (FREQUENCY) UP BUTTON UNTILL THE PERSONALITY READOUT (DISPLAY) APPEARS



EXAMPLE READOUT
252 A W T C C

CHP AREA
OFFICE
NUMBER

AREA SUB
PROGRAM
LETTER
(A-Z)

PROGRAM
REVISION
NUMBER

HEAD OPTIONS

C = CAR
M = MOTORCYCLE

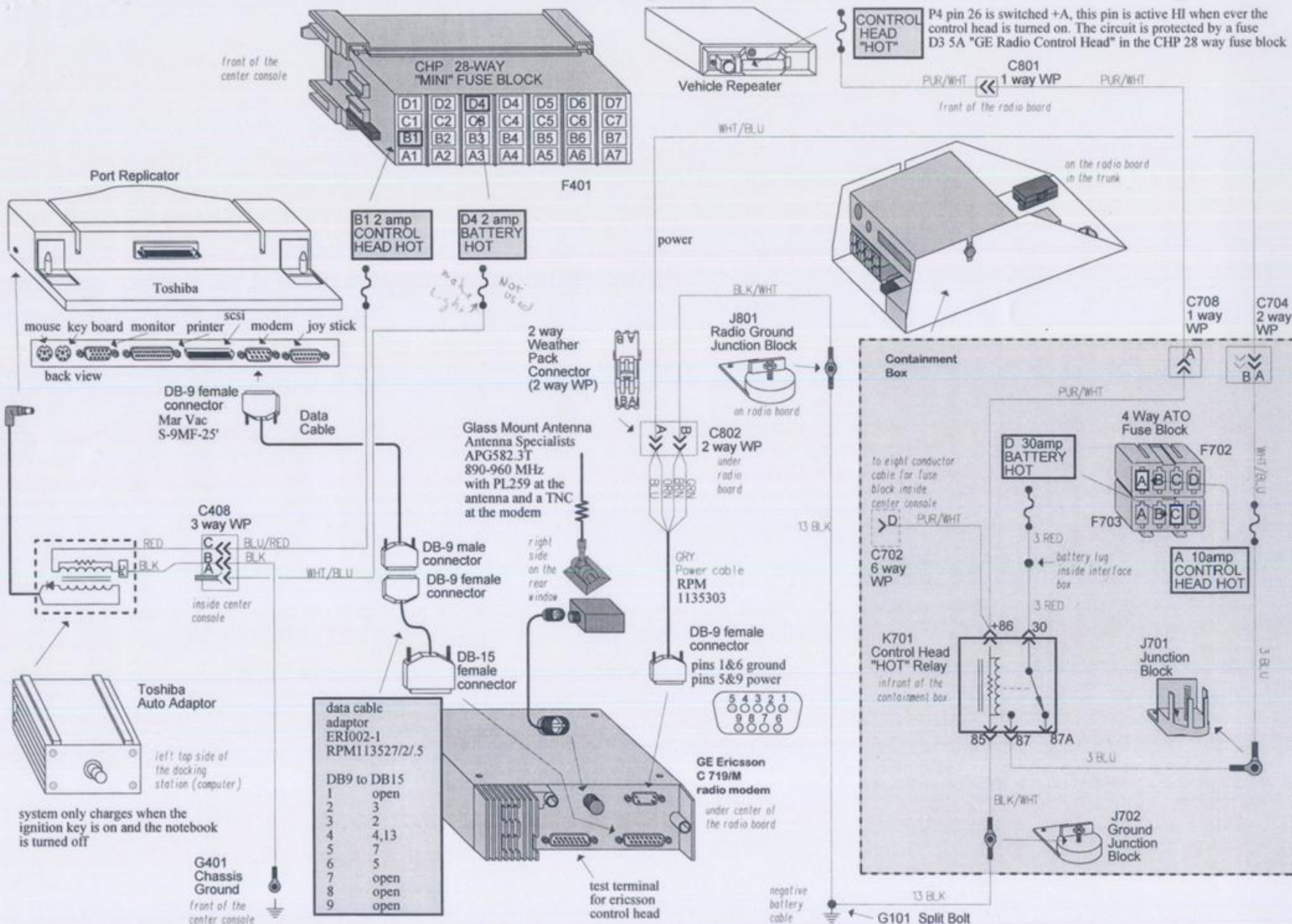
VOLUME TABLE

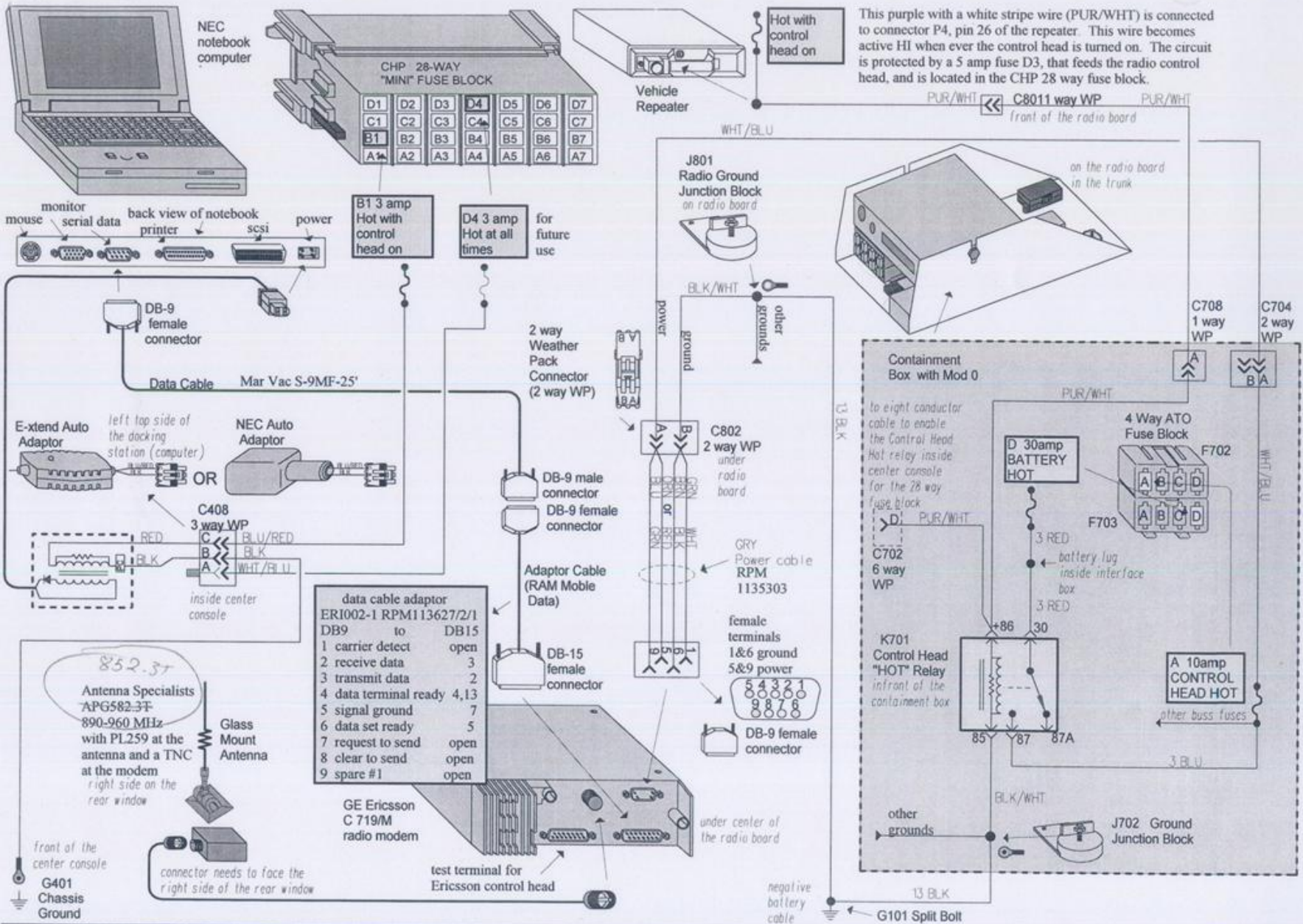
L = LINEAR
G = LOGARITHMIC
C = COMBINATION
logarithmic - inside
linear - outside
M = MOTORCYCLE

CONTROL HEAD DATA OUTPUT FORMAT

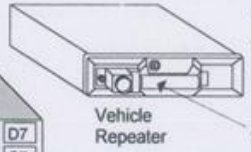
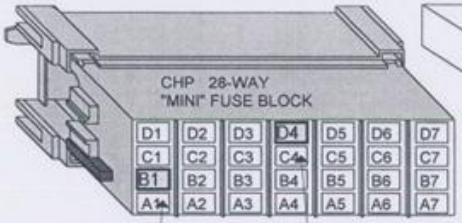
P = PARALLEL
S = SERIAL
T = TANDEM
M = MOTORCYCLE

we need to use
the TANDEM DATA
output in any vehicle
that has been built
sense 1992



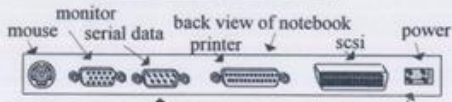


NEC notebook computer



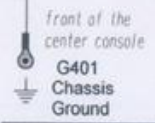
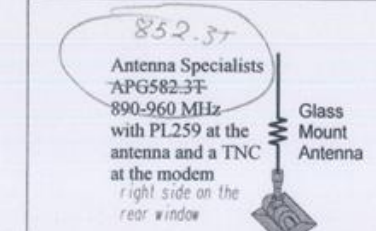
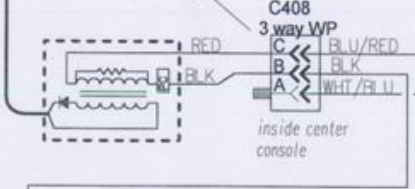
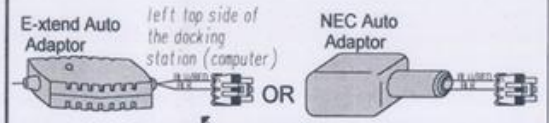
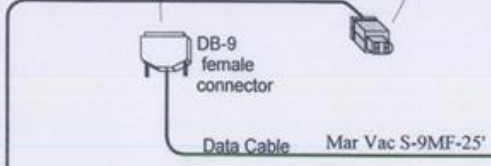
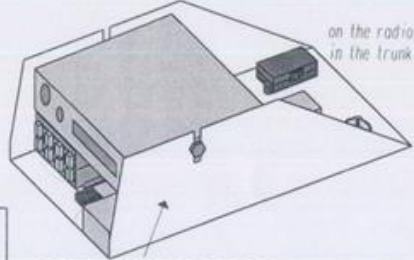
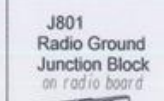
Hot with control head on

This purple with a white stripe wire (PUR/WHT) is connected to connector P4, pin 26 of the repeater. This wire becomes active HI when ever the control head is turned on. The circuit is protected by a 5 amp fuse D3, that feeds the radio control head, and is located in the CHP 28 way fuse block.



B1 3 amp Hot with control head on

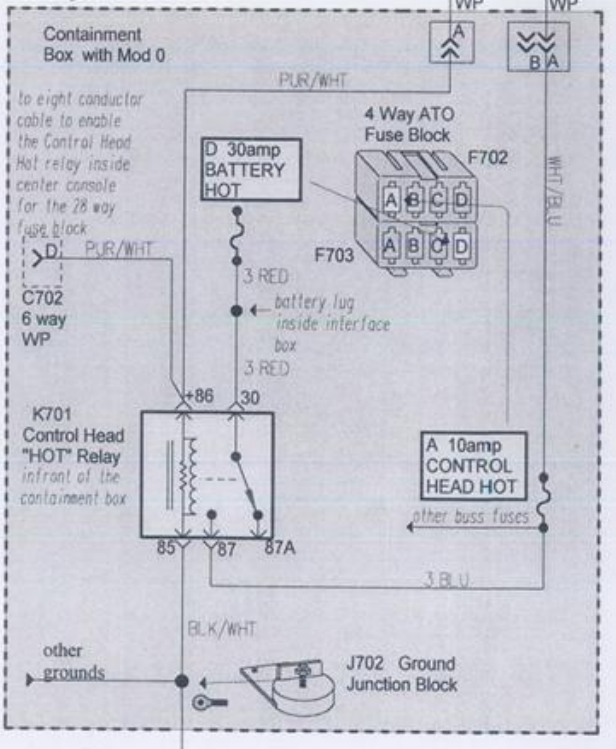
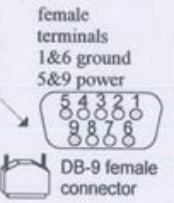
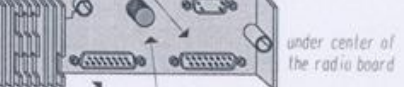
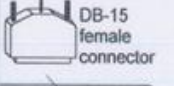
D4 3 amp Hot at all times for future use

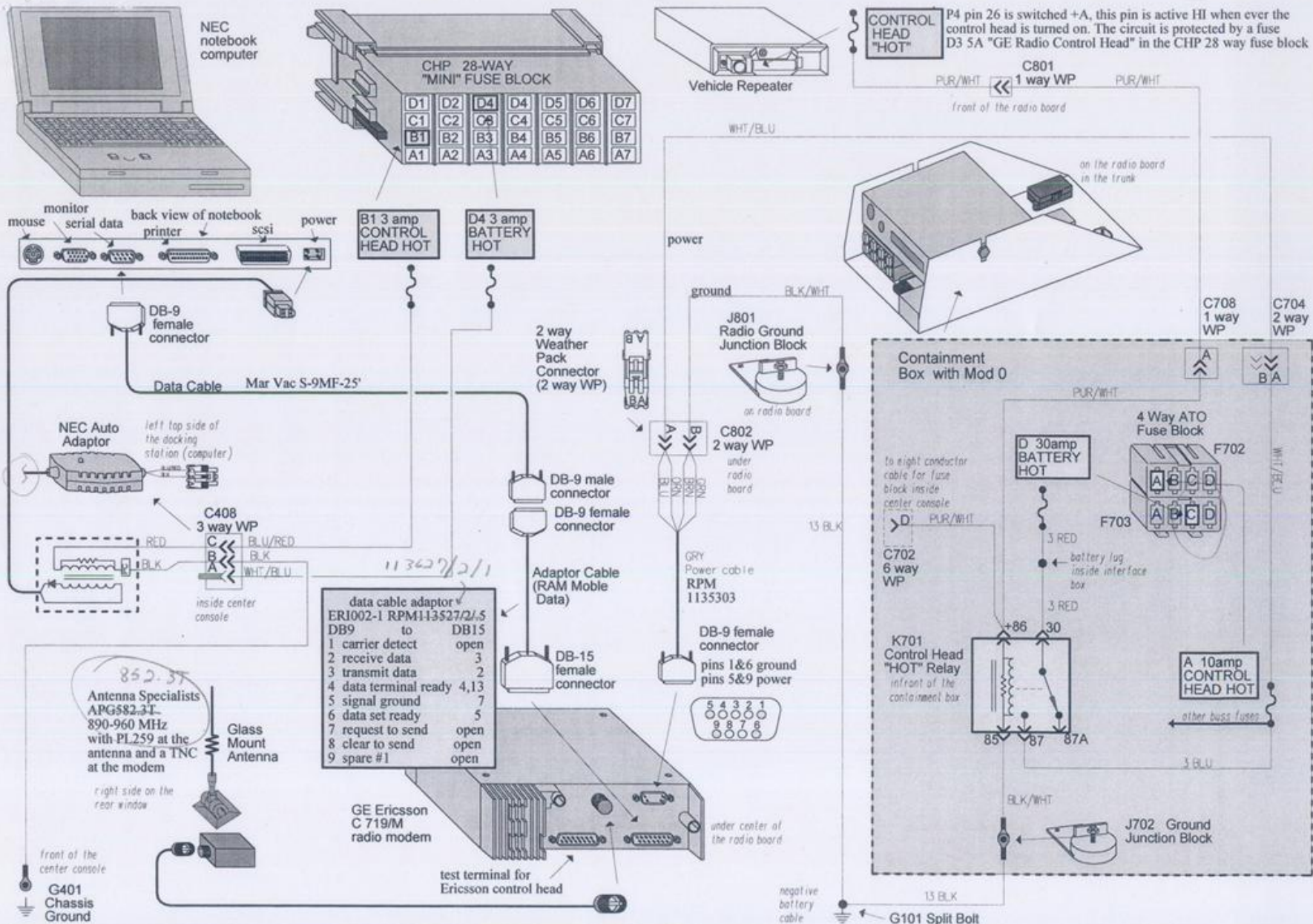


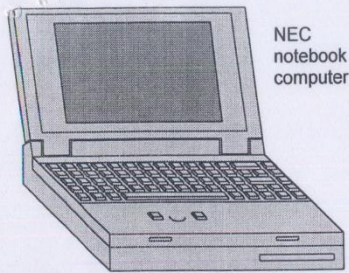
data cable adaptor
ERI002-1 RPM113627/2/1
DB9 to DB15

1 carrier detect	open
2 receive data	3
3 transmit data	2
4 data terminal ready	4,13
5 signal ground	7
6 data set ready	5
7 request to send	open
8 clear to send	open
9 spare #1	open

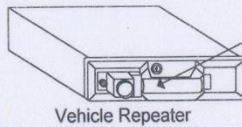
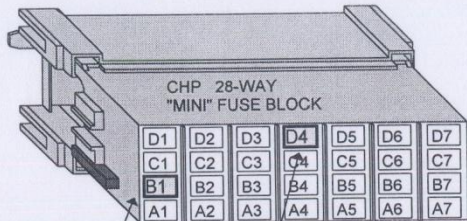
DB-9 male connector
DB-9 female connector







NEC notebook computer



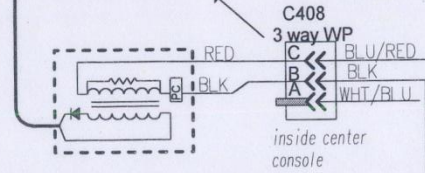
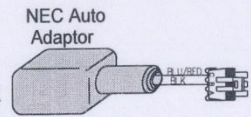
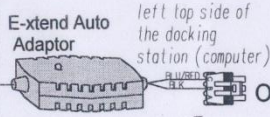
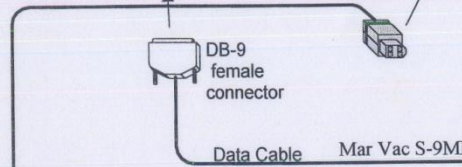
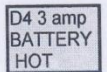
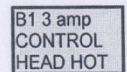
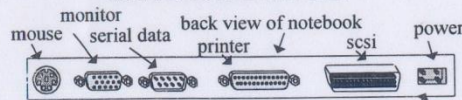
Vehicle Repeater



P4 pin 26 is switched +A, this pin is active HI when ever the control head is turned on. The circuit is protected by a fuse D3 5A "GE Radio Control Head" in the CHP 28 way fuse block
Routed the control head radio cable, radio cable

C8011

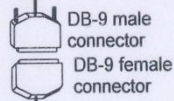
PUR/WHT ← way WP PUR/WHT
 front of the radio board



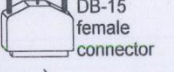
inside center console

113527/2/1

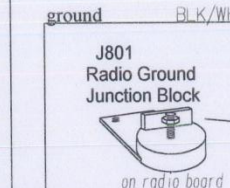
data cable adaptor	
ERI002-1 RPMH3527/2/1-S	
DB9	to DB15
1 carrier detect	open
2 receive data	3
3 transmit data	2
4 data terminal ready	4,13
5 signal ground	7
6 data set ready	5
7 request to send	open
8 clear to send	open
9 spare #1	open



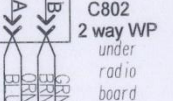
Adaptor Cable (RAM Mobile Data)



DB-15 female connector



on radio board



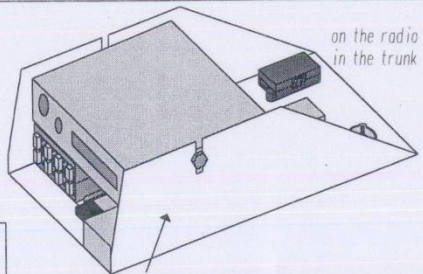
under radio board



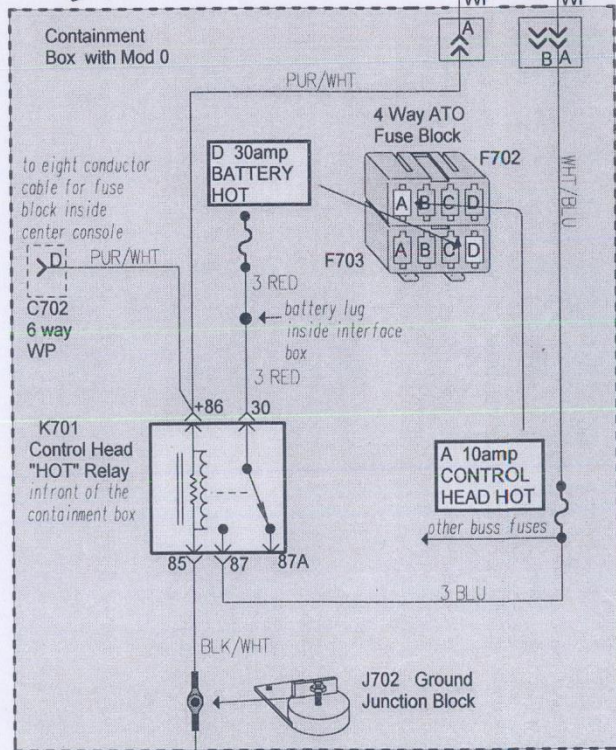
DB-9 female connector pins 1&6 ground pins 5&9 power



under center of the radio board



on the radio board in the trunk



Containment Box with Mod 0

4 Way ATO Fuse Block F702

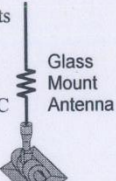
D 30amp BATTERY HOT

A 10amp CONTROL HEAD HOT

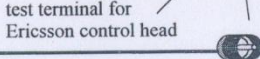
K701 Control Head "HOT" Relay

J702 Ground Junction Block

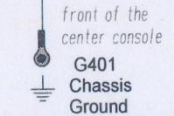
Antenna Specialists APG582.3T 890-960 MHz with PL259 at the antenna and a TNC at the modem right side on the rear window



GE Ericsson C 719/M radio modem



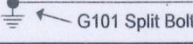
test terminal for Ericsson control head



G401 Chassis Ground

connector needs to face the right side of the rear window

negative battery cable



G101 Split Bolt

SALES PRICE \$3,500	DATE 1-18-00	VEHICLE NUMBER	<input type="checkbox"/> 100B <input type="checkbox"/> Sale list
LOCATION OF SALE PS074		COLOR WHITE	
Paint	\$	Tires	\$
Mechanical inspection	\$	Repair seat	\$
Reconditioning	\$	Battery	\$
Decal removal	\$	Other: (describe)	\$
Wheel alignment	\$		\$
Mufflers	\$		\$
Windshield	\$		\$
Side moulding	\$		\$
Pin-striping	\$		\$
Vinyl top	\$	<input type="checkbox"/> Police special <input type="checkbox"/> Black and white <input type="checkbox"/> As-is	TOTAL COSTS
VEHICLE NUMBER	LOCATION CODE		\$

MOTOR TRANSPORT SECTION
VEHICLE ASSIGNMENT, TRANSFER & SALE
 074-6 (Rev 2-95)

VEHICLE NUMBER
E902389

Sando

MAY 22 1997 SEP 28 1999

KEY # 03L2 CREDIT CARD SUB # 7003

COLOR B&W	BUDGET YEAR	PURCHASE ORDER	REPLACEMENT ORDERED	DELIVERY DATE
CLASS E	MAKE CHEVY CAPRICE	BODY 4DOOR	VIN 1G1BL52P2SR181195	LICENSE NUMBER E902389
TO REPLACE E897394		REPLACED BY 902271		DATE
DATE PLACED IN SERVICE 4/17/97		SURVEY DATE AND REASON R/O 10/1, 985		
VEHICLE NUMBER E902389	YEAR 95	R.F. COLOR GE-A	EQUIPMENT VICIOLIES	SCHED. NO. 990451
			PR DATE 6/11/99	LOCATION CODE 902271