

SPECIFICATIONS

OPERATING VOLTAGE: 9 - 14 VDC

POWER CONSUMPTION: ARMED .016 AMP
DISARMED .012 AMP
(@ 12.8 VDC)

PASSIVE ARMING: 30 seconds after closing last door
60 seconds after disarm if no door opened
30 seconds if sensor triggered
120 seconds if other input triggered

AUTO-ZONE BYPASS IF INPUT IS STILL ACTIVE AFTER 2 ALARM CYCLES

PANIC CYCLE: 5 minutes if allowed to run full cycle

CHIRP CIRCUIT: 1 Chirp = Arming
2 Chirps = Disarmed
3 Chirps = Disarmed with intrusion notice

TRANSMITTER:

500,000 Code Combinations
2 Button, 3 Channel

OUTPUTS - MAXIMUM RATINGS:

SIREN: 2 Amp positive (continuous)
LIGHT FLASH: 10 Amp positive (pulsed)
STARTER DISABLE: 20 Amp Built-in Relay
NEGATIVE ARMED: 150 mA continuous negative while armed
DOOR LOCK/UNLOCK: 150 mA negative/positive momentary
(some vehicles may require relays)

LED: 12mA negative (pulsed)

CS-8801SE SAMURAI REMOTE CONTROL ALARM SYSTEM

INSTALLATION HANDBOOK

CRIMESTOPPER
SECURITY PRODUCTS, INC.

AUTOMATIC RESET - Once the system has been triggered, it will automatically reset and rearm after a preset time period. This system will also bypass a zone if that zone remains active after two full cycles, for example: a door remains open after an attempted theft.

DEFECTIVE/ACTIVE ZONE BYPASS - Automatically shuts off trigger input if active during arming or rearming to prevent false alarms. The system automatically bypasses only the zone in which a problem exists, allowing the rest of the system to arm and protect your vehicle.

EMERGENCY DISARM/PROGRAM SWITCH - Allows user to disarm the security system in the event of a lost/damaged transmitter, and is also used for programming.

STARTER DISABLE CIRCUIT - Built-in 30 amp relay prevents engine from being started by disabling starter circuit when the system is armed.

FLASHING LIGHTS CIRCUIT - Allows parking lights to be connected for visual indication of arming, disarming, and triggered modes.

DOOR LOCK/UNLOCK OUTPUTS - Allows vehicle doors to be locked when arming and unlocked when disarming. Vehicle must be equipped with power locks or lock motors must be added.

PLANNING THE INSTALLATION

This Installation Handbook is arranged to guide you through the installation in a progressive order. All instructions prior to the OPTIONAL FEATURES section must be connected for proper system operation.

To ease and reduce installation time, this alarm system has been provided with a 3 foot long wire harness. We suggest you determine the most suitable location for all components to be mounted. Use a test meter to locate all points of connection such as: Power, Ground, Starter wire, Door lock/unlock, Parking Lights, etc. Check for existing pin switches on any openings to be protected.

Following this simple procedure will allow you route and cut wiring harness at the exact point of connection. You may solder or use crimp connectors to secure all connections.

INSTALLATION CAUTIONS & WARNINGS

BEFORE BEGINNING, CHECK ALL VEHICLE MANUFACTURER CAUTIONS AND WARNINGS REGARDING ELECTRICAL SERVICE. (AIR BAGS, ABS BRAKES, AND BATTERY)

TO PREVENT A POSSIBLE DEAD BATTERY IT MAY BE WISE TO REMOVE VEHICLE DOME LIGHT FUSE WHILE WORKING ON VEHICLE. MAKE CERTAIN TO REINSTALL FUSE PRIOR TO TESTING FOR DOOR TRIGGERS.

DO NOT EXCEED RATED OUTPUT MAXIMUMS - SERIOUS DAMAGE MAY OCCUR. SPECIFICATION PAGES CONTAIN OUTPUT MAXIMUMS FOR ALL ALARM FUNCTIONS. IF UNSURE ABOUT CURRENT LOAD, MEASURE LOAD WITH AN AMP-METER.

DO NOT TEST ANY 150mA OUTPUT WIRE WITH A TEST LIGHT. MANY TEST LIGHTS DRAW MORE CURRENT (AMPERES) THAN OUTPUT CAN PROVIDE. USE A VOLT/OHM METER TO TEST THESE OUTPUTS.

ORANGE ACCESSORY "ON" WIRE MUST BE CONNECTED. THIS WIRE CONTROLS MANY FUNCTIONS. SYSTEM WILL NOT OPERATE AS DESIRED IF LEFT UNCONNECTED.

DO NOT LENGTHEN, SHORTEN, OR GROUND ANTENNA WIRE. ANY ALTERATION OF THE ANTENNA WIRE MAY CAUSE UNDESIRABLE OPERATION OF THE SYSTEM.

REMOVE MAIN SYSTEM FUSE BEFORE JUMP STARTING BATTERY OR CHARGING AT HIGH BOOST DAMAGE MAY OCCUR TO SYSTEM IF PROPER PRECAUTIONS ARE NOT OBSERVED.

INSTALLATION PROCEDURES

ENGINE COMPARTMENT COMPONENT MOUNTING AND WIRING

POWER WIRE: RED 22 GAUGE WIRE

Using the supplied in-line fuse holder, connect RED wire to POSITIVE TERMINAL of vehicle battery. **DO NOT CONNECT MAIN POWER AT FUSE BOX OR IGNITION SWITCH.** Make certain FUSE IS REMOVED FROM HOLDER to prevent any possible shorts while routing wire. Route wire through engine compartment to the location where all wires will pass through vehicle firewall.

If using any POWER ACCESSORIES, such as power window modules, Door Locks, Trunk Release, etc..., route a **SEPARATE FUSED HEAVY GAUGE POWER WIRE** to power these accessories.

SIREN OUTPUT BROWN 22 GAUGE WIRE

POSITIVE 2 AMP MAX. OUTPUT

Mount Siren as high as possible. Make sure siren is mounted so that it points downward to prevent water from accumulating inside the cone. **DO NOT MOUNT NEAR EXHAUST MANIFOLD OR ANY OTHER EXCESSIVE HEAT SOURCE.**

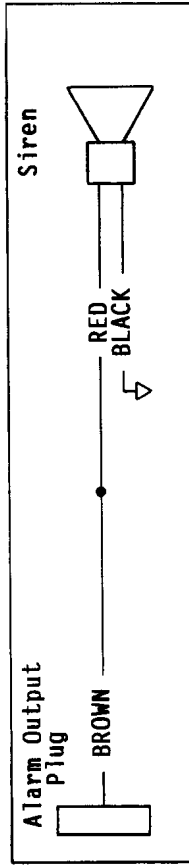
RECOMMENDED MOUNTING LOCATIONS: LEFT OR RIGHT FENDER WELL, ENGINE FIREWALL.

Route siren RED wire to location where all wires will pass through vehicle firewall.

A) Connect siren RED wire to BROWN wire of alarm.

B) Connect siren BLACK wire to CHASSIS METAL (ground).

To avoid possible RF interference, siren ground lead should be as short as possible.



HOOD/TRUNK TRIGGER GRAY 22 GAUGE WIRE

The GRAY wire is a negative trigger input for hood, trunk, or any other grounding pin switch.

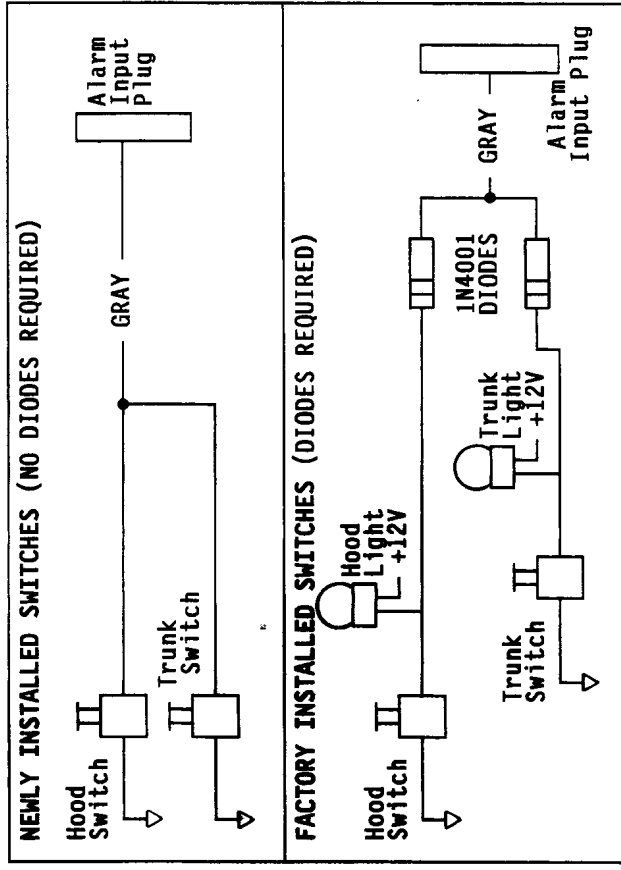
Use existing hood and trunk pin switches, provided they are ground switching. You **MUST** diode isolate existing switches to avoid any feed-back to, or from vehicle's electrical system. If additional switches are required, install pin switch and connect to GRAY wire of alarm.

If no existing switches are available, install new pin switch (it may be necessary to drill a hole) and connect to GRAY wire of alarm. no diodes will be necessary.

NOTE 1: Many existing hood switches are connected to a cooling fan relay so that if hood is opened serious injury can be avoided. Make certain you diode isolate these switches to avoid undesired operation or serious engine damage.

NOTE 2: DO NOT mount new pin switches in water pathways. Special mounting brackets are available to solve unique installation problems. (CS-121 FLAT, CS-122 RIGHT ANGLE)

NOTE 3: It may be necessary to spray the vehicle with water to identify water pathways before mounting pin switch.



INTERIOR AND UNDERDASH COMPONENTS AND WIRING

ALARM CONTROL MODULE MOUNTING

The alarm should be mounted in a concealed location. If located underdash, unit should be placed as high as possible and not easily accessible by an intruder.

Placement will effect the distance at which the transmitter can control the unit, because the RF receiving antenna extends from the module. The wire antenna should be routed at least 1/2 inch away from the nearest metal. DO NOT alter the length of antenna wire, operating range will be adversely effected.

WIRE ROUTING

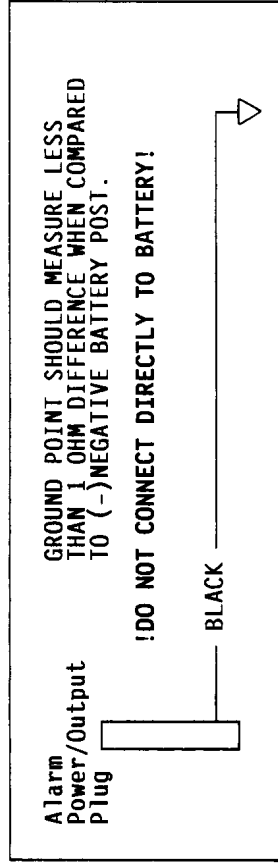
Once a concealed location for the control module has been found, the wire harness should be routed so when connections have been completed, the control module can be mounted without having an excess of wire left over, and module can be easily removed and reinstalled.

Place alarm control module with wire harnesses attached, into chosen location. Route wire from control module to an area where all wires are easily accessible for making all connections. **MAKE SURE TO LEAVE A SERVICE LOOP OF WIRE CLOSE TO THE CONTROL MODULE.** Wire tie harnesses to an existing vehicle wire harness. Remove control brain from mounting location, and disconnect from harnesses. YOU ARE NOW READY TO START WIRING THE SYSTEM.

GROUND WIRE: BLACK 22 GAUGE

THIS WIRE MUST BE CONNECTED TO CHASSIS METAL OF THE VEHICLE. Scrape away any paint or dirt from the connection point to ensure a good connection.

NOTE: ATTACH ANY OTHER GROUNDS ASSOCIATED WITH THE ALARM TO THIS SAME POINT, SUCH AS GROUNDS FOR PASSIVE SWITCH.



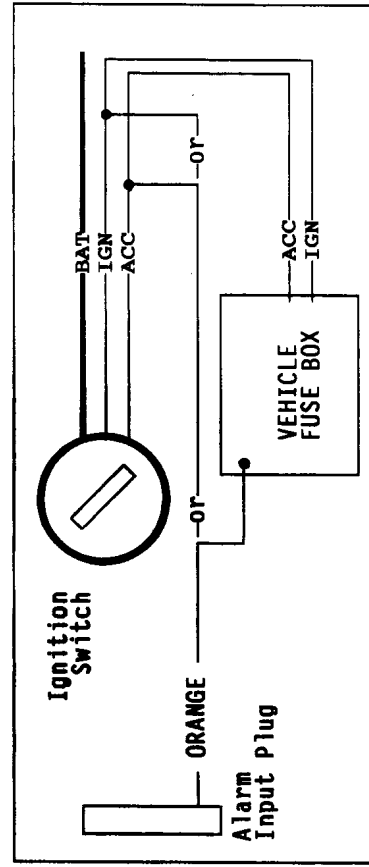
ACCESSORY WIRE: ORANGE 22 GAUGE

This wire controls several functions of the security system and **MUST BE CONNECTED.**

Connect alarm **ORANGE** wire to a wire that shows +12 volts when the ignition switch is "ON" OR "ACC".

RECOMMENDED CONNECTION POINTS:

Accessory or Ignition port of fuse box, Accessory or Ignition wire in steering column, Radio switched power wire.



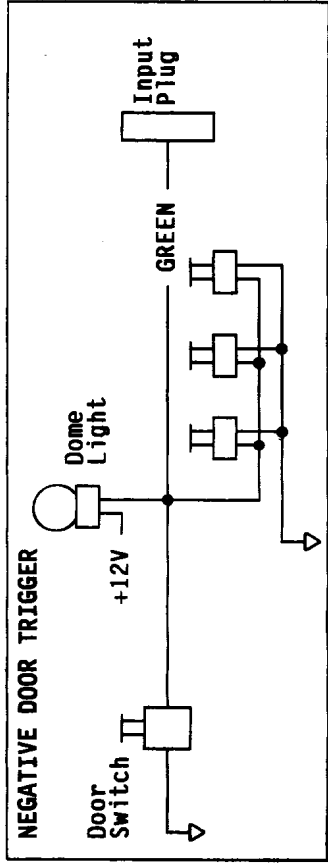
DOOR TRIGGERS: GREEN 22 GAUGE - NEGATIVE TRIGGER
YELLOW 22 GAUGE - POSITIVE TRIGGER

A Volt/Ohm meter will help you easily identify the door pin switch wire. With meter set to Volt scale, connect common lead of meter to ground and probe wire suspected of being the door pin switch wire.

A NEGATIVE DOOR SWITCH WILL READ 0.0 VOLT WHEN DOOR IS "OPEN", AND AT LEAST 12.0 VOLTS WHEN DOOR IS "CLOSED"

A POSITIVE DOOR SWITCH WILL READ AT LEAST 12.0 VOLTS WHEN DOOR IS "OPEN" AND 0.0 VOLTS WHEN DOOR IS "CLOSED"

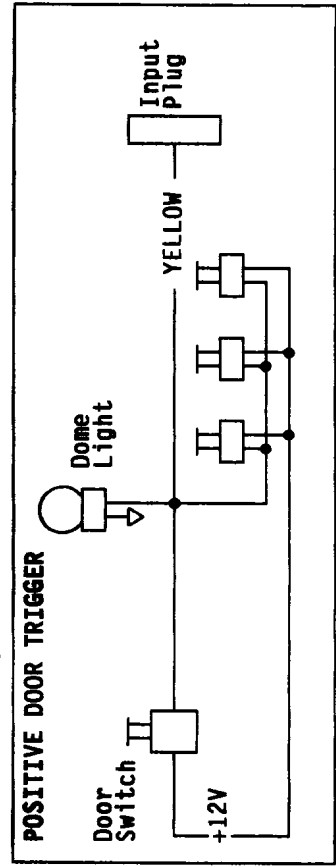
GREEN: Negative door trigger for most domestic and imported vehicles. Connect to existing door pin switch.



NOTE: SOME VEHICLES USE A DIODE TO ISOLATE THE DRIVER DOOR, ON THESE VEHICLES ALL DOORS WILL NOT TRIGGER IF DRIVERS DOOR SWITCH IS USED. ALWAYS TEST TO MAKE SURE ALL DOORS TRIGGER WHEN CONNECTING THIS WIRE.

YELLOW: Positive door trigger (most Ford vehicles). Connect to door pin switch.

NOTE: Some Ford vehicles use negative trigger. For these vehicles use the GREEN input wire. (Escort, Probe, Merkur, Festiva, Tracer)



SENSOR TRIGGER BLUE 22 GAUGE
THIS INPUT WIRE IS DESIGNED TO ACCEPT ONLY SENSORS. CONNECTING THE SENSOR TO ANY OTHER CIRCUIT OF THE SYSTEM WILL RESULT IN UNDESIRABLE OPERATION. DO NOT CONNECT ANY DEVICE OTHER THAN A SENSOR TO THIS WIRE.

- SENSORS THAT MAY BE CONNECTED TO THIS WIRE INCLUDE:
- CS-95 MICROGUARD
 - CS-96 SHOCK/IMPACT (included)
 - CS-98 DOPPLER
 - CS-101 MOTION
 - CS-103 GLASS BREAK
 - CS-104 PIEZO SHOCK

SENSOR WILL NOT TRIGGER ALARM UNTIL 8 SECONDS AFTER RED DASH LED STARTS FLASHING RAPIDLY.

SHOCK SENSOR MOUNTING(CS-96)

THIS SENSOR IS DESIGNED TO BE MOUNTED IN THE VEHICLE INTERIOR. This system is supplied with a electromagnetic impact sensor. It will sense impact to the vehicle and provide a negative output for alarm trigger.

DO NOT MOUNT IN ENGINE COMPARTMENT OR IN ANY AREA WHERE WATER COULD GET INTO THE SENSOR.

MOUNTING LOCATIONS:

- Dashboard Support Strut
- Underdash Wire Harness
- Heater/Air Conditioning Ducting
- Steering Wheel Column
- Interior Side Engine Firewall

These are only recommendations. There may be other locations or positions that may be better suited to your application. Some of the locations above will provide better sensitivity than others depending on your particular vehicle, and what you are most interested in protecting.

METHODS OF MOUNTING INCLUDE:

- Wire Ties
- Screws
- Double Sided Tape

WIRING

There are 3 wires to connect to make this sensor operate.
RED - Connect to +12 Volt battery constant.
BLACK - Connect to vehicle chassis ground.
BLUE - Connect to BLUE wire of CRIMESTOPPER ALARM

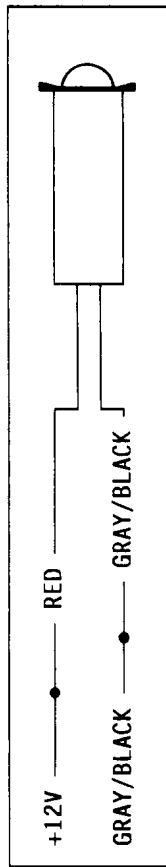
ADJUSTING SENSOR SENSITIVITY

LED on sensor will light when enough vibration is detected to cause a trigger for that output.
Red LED will activate when sensor is triggered.
Adjust sensor by creating impact to the several areas of the vehicle to see if settings are sufficient to create a trigger.
Turn adjustment pot CLOCKWISE to INCREASE sensitivity.
Turn adjustment pot COUNTER-CLOCKWISE to DECREASE sensitivity.

LED WIRING

ARM LED STATUS INDICATOR GRAY/BLACK 22 GAUGE
 LED should be located in a visible location on the dashboard or console. Selected location must have a minimum clearance of one inch behind it.
DRILL A 5/16" HOLE IN CHOSEN LOCATION

Connect LED Red wire to +12 volts constant.
 Connect LED Gray/Black wire to alarm Gray/Black 22 gauge.



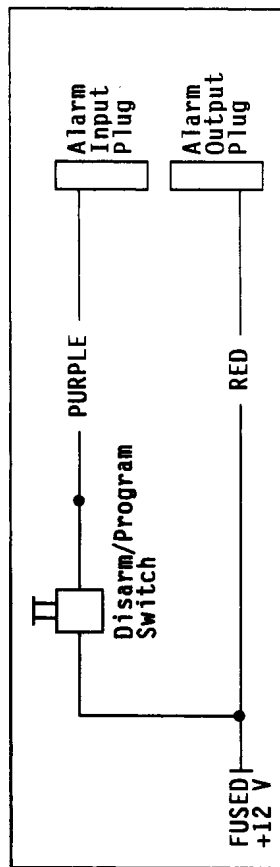
EMERGENCY DISARM SWITCH PURPLE 22 GAUGE

The Emergency Disarm switch is a momentary button that disarms the system in the event of a lost or damaged transmitter. Mount switch in passenger compartment in a hidden location. The user **MUST** be able to access this switch in an emergency.

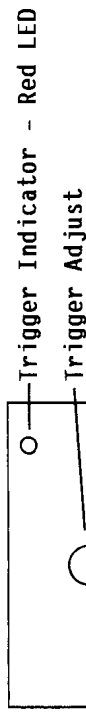
Connect PURPLE wire of switch to PURPLE wire of alarm.
 Connect BLACK wire of switch to ALARM MAIN POWER WIRE.

TO DISARM ALARM, TURN IGNITION TO "ON", DEPRESS AND HOLD SWITCH UNTIL ALARM SHUTS OFF (APPROX. 4 SECONDS).

NOTE 1: THIS SWITCH IS ALSO USED FOR SYSTEM PROGRAMMING, AND MUST BE INSTALLED.



Sensitivity Adjustment Controls



NOTE ON ADJUSTMENT:
 UNIT WILL TURN OFF IF ADJUSTMENT IS TURNED ALL THE WAY COUNTER-CLOCKWISE. UNIT MUST BE TURNED SLIGHTLY CLOCKWISE FROM MINIMUM IN ORDER TO OPERATE.

IMPORTANT NOTE ON ADJUSTMENT

This sensor has been designed with a low frequency filter to eliminate common causes of false triggers (trains, heavy truck traffic, commercial jet noise, multi-level parking structures).

To properly Test and Adjust this sensor, cause impact to the vehicle using Knuckles, or Plastic or Wood handles. These create a higher frequency that will be detected by the sensors. Always take caution and care not to damage the vehicle when testing.

OPTIONAL FEATURES

THE FOLLOWING FEATURES ARE DESIGNED INTO THIS SECURITY SYSTEM, BUT ARE NOT NECESSARY TO CONNECT TO MAKE THE SYSTEM OPERATE. HOWEVER, ONE OR MORE OF THESE FEATURES ARE USUALLY DESIRED AS PART OF ANY SECURITY SYSTEM.

EXTRA PARTS AND/OR LABOR WILL BE REQUIRED TO CONNECT THESE OPTIONAL FEATURES

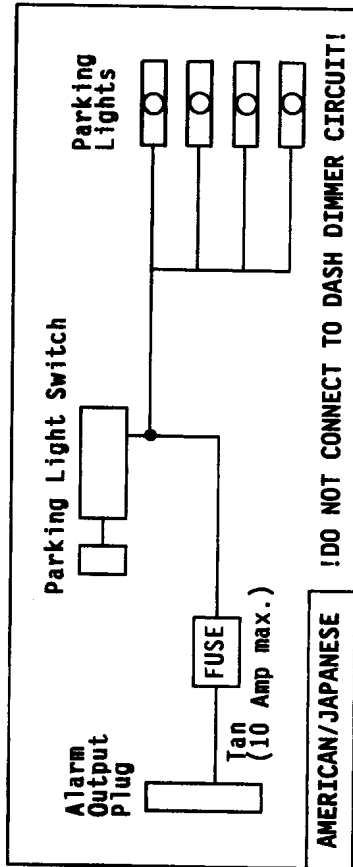
- FLASHING LIGHTS**
- STARTER DISABLE**
- NEG. ARMED OUTPUT**
- POWER DOOR LOCK/UNLOCK**
- PASSIVE ARMING**

FLASHING LIGHT OUTPUT

TAN 22 GAUGE WIRE
POSITIVE 10 AMP MAX. OUTPUT

TAN OUTPUT WIRE MUST BE FUSED OR SERIOUS DAMAGE MAY OCCUR.

On most AMERICAN and JAPANESE vehicles, the parking lights will operate on a single fused circuit. You may connect TAN wire directly to the back of any parking light or at main lighting switch.



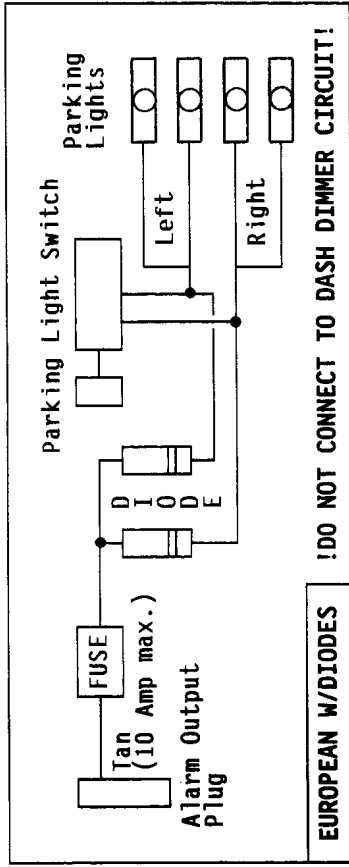
AMERICAN/JAPANESE !DO NOT CONNECT TO DASH DIMMER CIRCUIT!

NOTE: Some Japanese vehicles use a ground triggered relay to activate parking lights. This ground trigger wire can be easily located in the steering column harness. Use a relay to convert to ground switch or tap into lights after relay.

FLASHING LIGHT OUTPUT

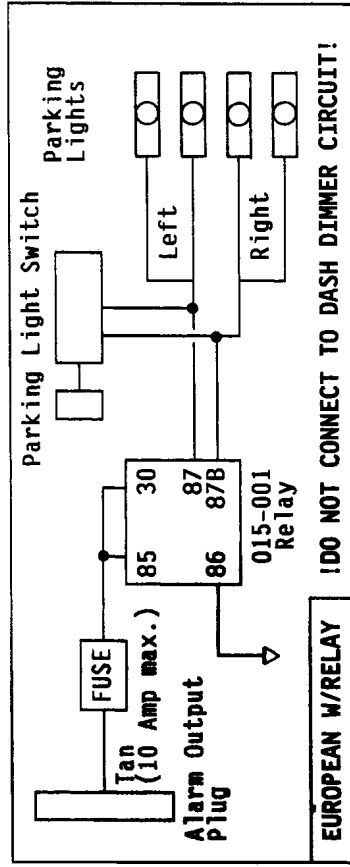
TAN 22 GAUGE WIRE
POSITIVE 10 AMP MAX. OUTPUT

On most EUROPEAN vehicles, the light circuits are separately fused for left and right. Each circuit must be individually connected and isolated from one another. This can be done by using two(2) 6A05 6 Amp diodes, OR one(1) BOSCH spst dual output relay(part no. 0-332-015-001).



EUROPEAN W/DIODES !DO NOT CONNECT TO DASH DIMMER CIRCUIT!

OR



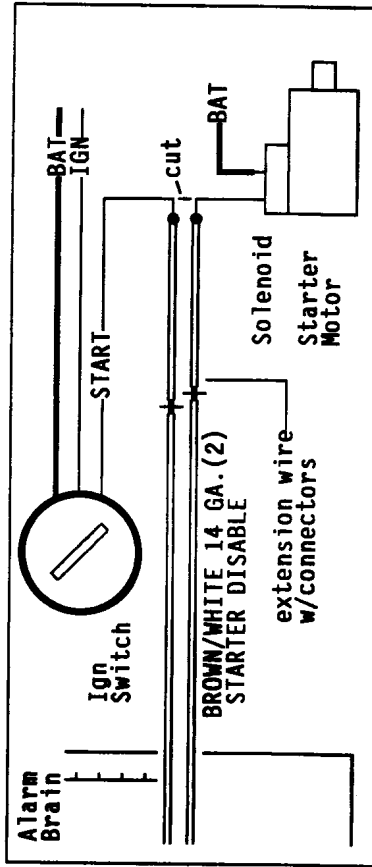
EUROPEAN W/RELAY !DO NOT CONNECT TO DASH DIMMER CIRCUIT!

STARTER DISABLE RELAY BUILT-IN BROWN/WHITE 14 GAUGE WIRES(2)

TWO BROWN/WHITE 14 GAUGE WIRES come out of the alarm control module. These wires CONNECT DIRECTLY TO VEHICLE STARTER WIRE. Use the supplied starter kill extension wires with the quick disconnect connectors to connect to the starter wire. This starter disable output uses the NORMALLY CLOSED contacts to interrupt the starter.

To locate the vehicle starter wire, use a volt meter to probe for a wire that shows +12 volts when the ignition key is turned to the "crank" position only. Possible sources are:

- 1) Ignition switch harness
 - 2) Starter relay or solenoid
 - 3) Neutral safety switch (Automatic transmissions)
- Connect as shown in diagram below.



NEGATIVE ARMED OUTPUT BROWN/WHITE 22 GAUGE
This wire will provide a continuous 150mA ground output when system is ARMED. This wire may require the use of a relay.

Uses for this wire may be:
ADDITIONAL VEHICLE DISABLE(Ignition or Fuel Cut-off)
VOICE MODULE ACTIVATION
SENSOR TURN-ON (CS-96DSR)
SCANNER LED'S(CIA 64 AUTO TRACERS™)

DOOR LOCK/UNLOCK INTERFACING

This security system comes equipped with positive/negative switching door lock/unlock outputs, and has the capability of locking and unlocking most vehicle power locking systems.

WHEN SYSTEM IS ARMED: (LOCK)

GRAY/RED sends a (-)Negative pulse
BLUE/RED sends a (+)Positive pulse

WHEN SYSTEM IS DISARMED: (UNLOCK)

GRAY/RED sends a (+)Positive pulse
BLUE/RED sends a (-)Negative pulse

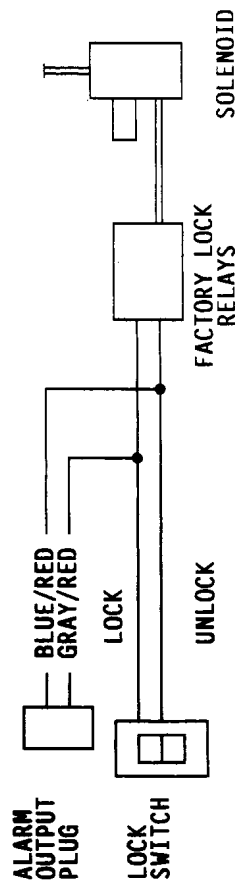
SOME VEHICLES, SUCH AS MERCEDES-BENZ AND AUDI, MAY REQUIRE THE USE OF A SPECIAL DOOR LOCK TIMER MODULE (PART No. CS-6400) TO OPERATE WITH THIS SYSTEM.

1. NEGATIVE TRIGGER SYSTEMS

Found in most Japanese vehicles, some FORD, and some BMW's. A ground pulse is used to activate factory relays or a central locking control module. Use a volt/ohm meter to identify lock and unlock wires.

USE REVERSING POLARITY TESTING PROCEDURE TO VERIFY THE SYSTEM IS NOT REVERSING POLARITY BEFORE PROCEEDING (PAGE 17).

Set meter to volt scale, with RED probe connected to +12 volt constant. Probe suspected lock and unlock wires with BLACK probe. When factory switch is activated, meter will read about 12.0 volts. Once wires are identified, connect using diagram below.

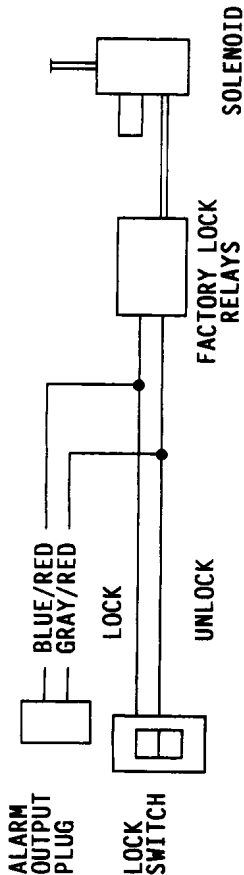


2. POSITIVE TRIGGER SYSTEMS

Found in most GM's, some FORD, and some BMW's. A positive +12 volt pulse is used to activate factory relays or a central locking control module. Use a volt/ohm meter to identify lock and unlock wire.

USE REVERSING POLARITY TESTING PROCEDURE TO VERIFY THE SYSTEM IS NOT REVERSING POLARITY BEFORE PROCEEDING (PAGE 17).

Set meter to volt scale, with BLACK probe connected to ground, Probe suspected lock and unlock wires with RED probe. When factory switch is activated, meter will read about 12.0 volts. Once wires are identified, connect using diagram.

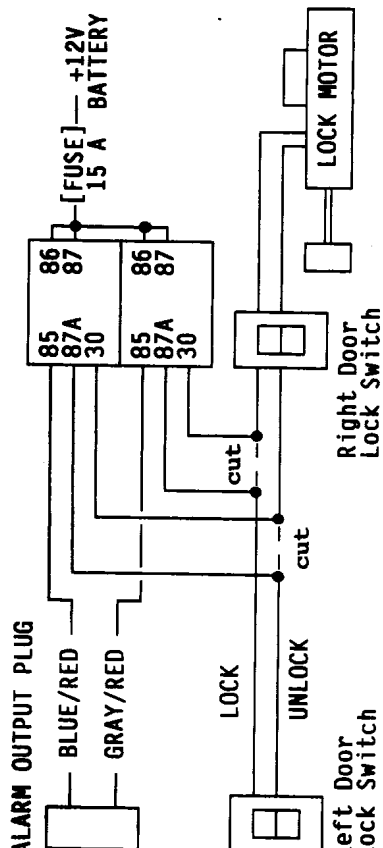


3. REVERSING POLARITY SYSTEMS

With this system, all switching for lock and unlock is controlled by the switch. There are NO RELAYS OR CONTROL MODULE. This system is used on most Chrysler/Dodge(not import), GM and Ford trucks, Mustangs, and Corvettes.

USE REVERSING POLARITY TESTING PROCEDURE TO LOCATE PROPER LOCK AND UNLOCK WIRES. TEST PROCEDURE IS LOCATED ON PAGE 17.

THIS INTERFACE REQUIRES THE USE OF 2 SPDT RELAYS, PICTURED BELOW. (CS PART NO. CS402A, BOSCH PART NO. 0-332-204-150)
LEFT DOOR MASTER CIRCUIT PICTURED - SOME VEHICLES USE RIGHT DOOR MASTER CIRCUITS (CORVETTE, 93 FIREBIRD, 93 CAMARO)



TESTING FOR REVERSE POLARITY DOOR LOCKS WITH A VOM

(5 WIRE SWITCH)

Reversing polarity switches use one switch as a "master" to provide grounds to the motors. When either switch is pressed one of the grounds is "lifted" and +12 volts is applied causing the locks to activate. When testing, the CORRECT INTERFACE WIRES will switch voltage from only one of the switches, the "master" switch.

SET METER TO VOLT SCALE SUFFICIENT TO MEASURE UP TO 15 VOLTS
CONNECT RED METER PROBE TO CONSTANT 12VOLT SOURCE.

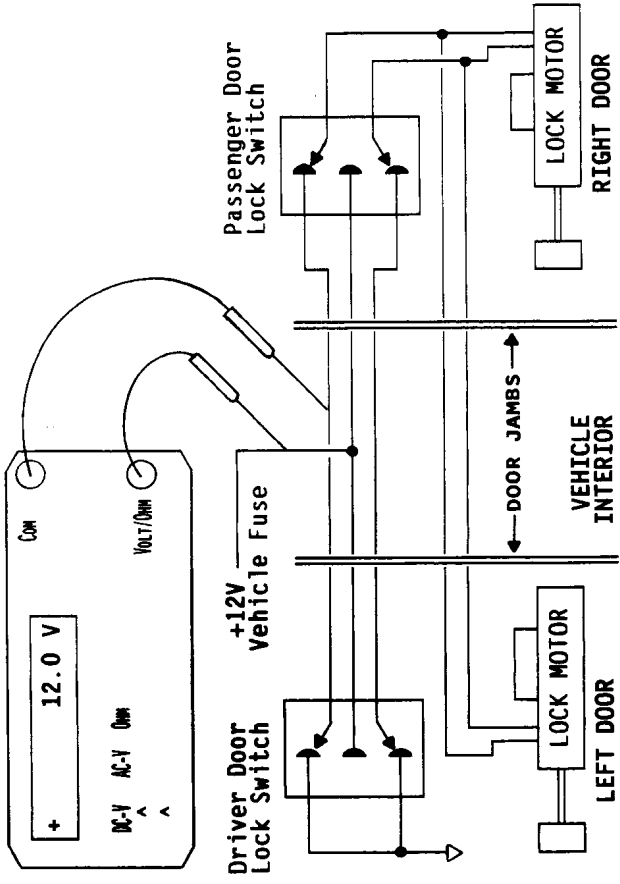
CONNECT BLACK METER PROBE TO THE FOLLOWING WIRES ONE AT A TIME:

| | | | |
|----------|-------------------|----|------------------------|
| FORD | -- PINK/LT. GREEN | GM | - LT. BLUE and |
| MERCURY | PINK/YELLOW | | DARK BLUE or |
| | ----- | | BLACK(CARS) or |
| CHRYSLER | - ORANGE/VIOLET | | BLACK/WHITE(TRUCKS) or |
| | - PINK/VIOLET or | | BLACK/RED(TRUCKS) |
| | - ORANGE* | | |
| | - PINK* | | |

* There may be two(2) wires of the same color.

CONNECT METER TO FIRST WIRE, METER SHOULD READ APPROXIMATELY 12 VOLTS. PRESS LEFT DOOR LOCK SWITCH TO THE LOCK POSITION, THEN UNLOCK POSITION. ONE OF THE POSITIONS SHOULD MAKE METER READ 0 VOLTS WHEN SWITCH IS PRESSED. IF METER DOES NOT READ, TRY RIGHT LOCK SWITCH. THIS WILL DETERMINE LEFT OR RIGHT MASTER SYSTEM. When meter reads 0 volts when lock is pressed, that wire is the LOCK wire. If Meter Reads 0 Volts when UNLOCK position is pressed, that wire is the UNLOCK wire.

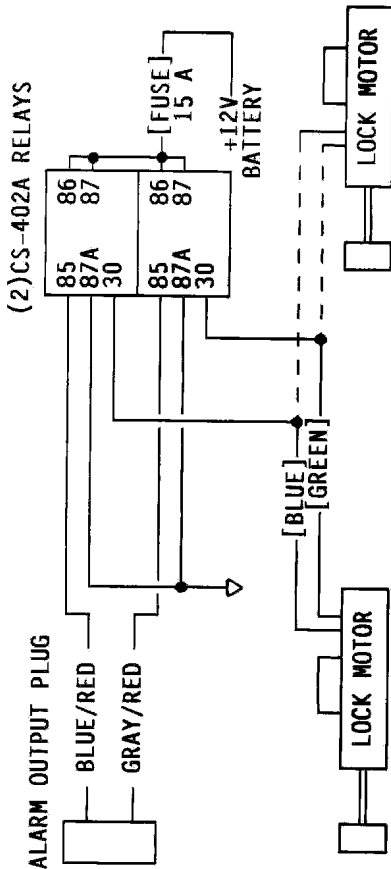
REPEAT THE TEST PROCEDURE ABOVE FOR SECOND WIRE.
REMEMBER - CORRECT WIRES WILL SHOW 0 VOLTS FROM ONLY 1 SWITCH.



4. SEMI-AUTOMATIC AND AFTERMARKET SYSTEMS

A semi-automatic system is one in which ONLY the driver door lock system will lock and unlock all doors. For these systems it will be necessary to install a CS-610S-2 door lock actuator. These systems are most commonly found on Nissan/Datsun, Volvo, Saab, Peugeot, and Volkswagen.

For vehicles not equipped with power locking, CS-610S-1 actuators may be installed in all doors. Follow diagram below for all CS-610 door lock actuators.

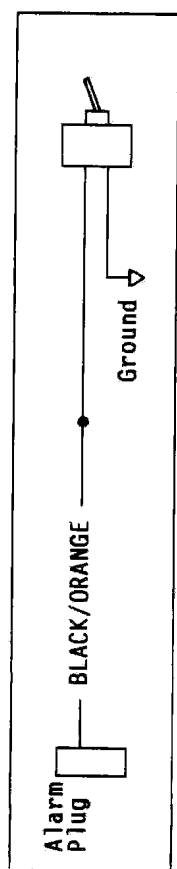


PASSIVE ARMING SWITCH

A Switch is provided to allow passive arming to be engaged (turn "on") and disengaged (turn "off"). The alarm system has two modes of operation.

- 1) **PASSIVE SWITCH "ON"**: System will arm automatically 30 seconds after last door is closed or system can be armed with transmitter.
- 2) **PASSIVE SWITCH "OFF"**: System will arm only with transmitter.

Passive arming is "ON" when dash LED is lighted solid after turning ignition "OFF" and door is open. If a door is left open, passive arming will not begin. When the door is closed, passive arming will arm system in 30 seconds. If door is reopened before 30 sec., arming stops. **IGNITION MUST BE "ON" WHEN CHANGING MODES.**



TRANSMITTER CODE LEARNING

This security system features a sophisticated Code Learning process. System cannot be programmed unless disarmed. The Alarm actually "learns" the code of each Transmitter. The transmitter code has been randomly selected (coded) at the factory from over 500,000 combinations.

The alarm control module is capable of accepting up to 4 different transmitter codes. This is to allow you to program additional remotes to operate the same system.

When two(2) Vehicles are protected, you may operate both from one transmitter. Follow the 2 VEHICLE PROGRAMMING instructions to program this feature.

TRANSMITTER PROGRAMMING PROCEDURE

TO PROGRAM, THE FOLLOWING PROCEDURE MUST BE PERFORMED:

- 1) ALARM MUST BE DISARMED.
- 2) TURN IGNITION TO "ON" POSITION.
- 3) PRESS AND HOLD BOTH TRANSMITTER BUTTON #1 AND PROGRAM SWITCH, AT THE SAME TIME. SIREN WILL CHIRP TO INDICATE THE TRANSMITTER CODE HAS BEEN ACCEPTED.
- 4) RELEASE BOTH TRANSMITTER AND OVERRIDE BUTTONS.
- 5) PROGRAM ADDITIONAL REMOTES AS NECESSARY USING STEPS 3 & 4 ABOVE.

2 VEHICLE OPERATION

To have a single transmitter operate TWO alarm systems it will be necessary to connect "2 VEH" program pad of BOTH alarm systems. This will allow both systems to be operated by the transmitters of each vehicle. This program pad is located under the access door on the bottom of the alarm control brain

2 VEHICLE PROGRAMMING PROCEDURE

When programming two vehicles follow the procedure below:

- A) Make certain "2 VEH" pad is soldered on both units.
- B) Program transmitters of VEH.#2 to Veh. #1: Depress BUTTON #2 OF SECOND VEHICLE TRANSMITTERS during step #3 of TRANSMITTER PROGRAMMING PROCEDURE.
- C) Program transmitters of VEH.#1 to Veh. #2: Depress BUTTON #2 OF FIRST VEHICLE TRANSMITTERS during step #3 of TRANSMITTER PROGRAMMING PROCEDURE.
- D) 2 Vehicle Programming is now complete.

TESTING

ARM/DISARM

ARM SYSTEM:

- SIREN CHIRPS ONCE
- LIGHTS FLASH ONCE
- DASH L.E.D. FLASHES RAPIDLY
- DOORS LOCK (if equipped)

DISARM SYSTEM:

- SIREN CHIRPS TWICE
- LIGHTS FLASH TWICE
- DASH L.E.D. STOPS FLASHING
- DOORS UNLOCK (if equipped)

PASSIVE/AUTOMATIC ARMING

WITH DOOR OPEN, TURN IGNITION TO ON THEN OFF. IF DASH LED TURNS ON SOLID, PASSIVE SELECT SWITCH IS "ON", AND ALARM WILL ARM 30 SECONDS AFTER DOOR CLOSES. IF DASH LED STAYS OFF, TURN PASSIVE SELECT SWITCH TO OPPOSITE POSITION, TURN IGNITION ON THEN OFF, DASH LED WILL LIGHT SOLID TO INDICATE PASSIVE ARMING "ON".

TRIGGERING

ARM SYSTEM(see above),
(unlock door with key if equipped
with power locks)

OPEN AND CLOSE DOOR, DASH L.E.D. WILL FLASH ONCE WITH

A LONG PAUSE BETWEEN FLASHES.

SYSTEM WILL SOUND FOR 2 MIN., THEN RESET AND STAY ARMED.

OPEN AND CLOSE HOOD/TRUNK, DASH L.E.D. WILL FLASH TWICE WITH

A LONG PAUSE BETWEEN FLASHES.

SYSTEM WILL SOUND FOR 2 MIN., THEN RESET AND STAY ARMED.

WAIT 8 SECONDS AFTER RESET, ACTIVATE SHOCK/IMPACT SENSOR.

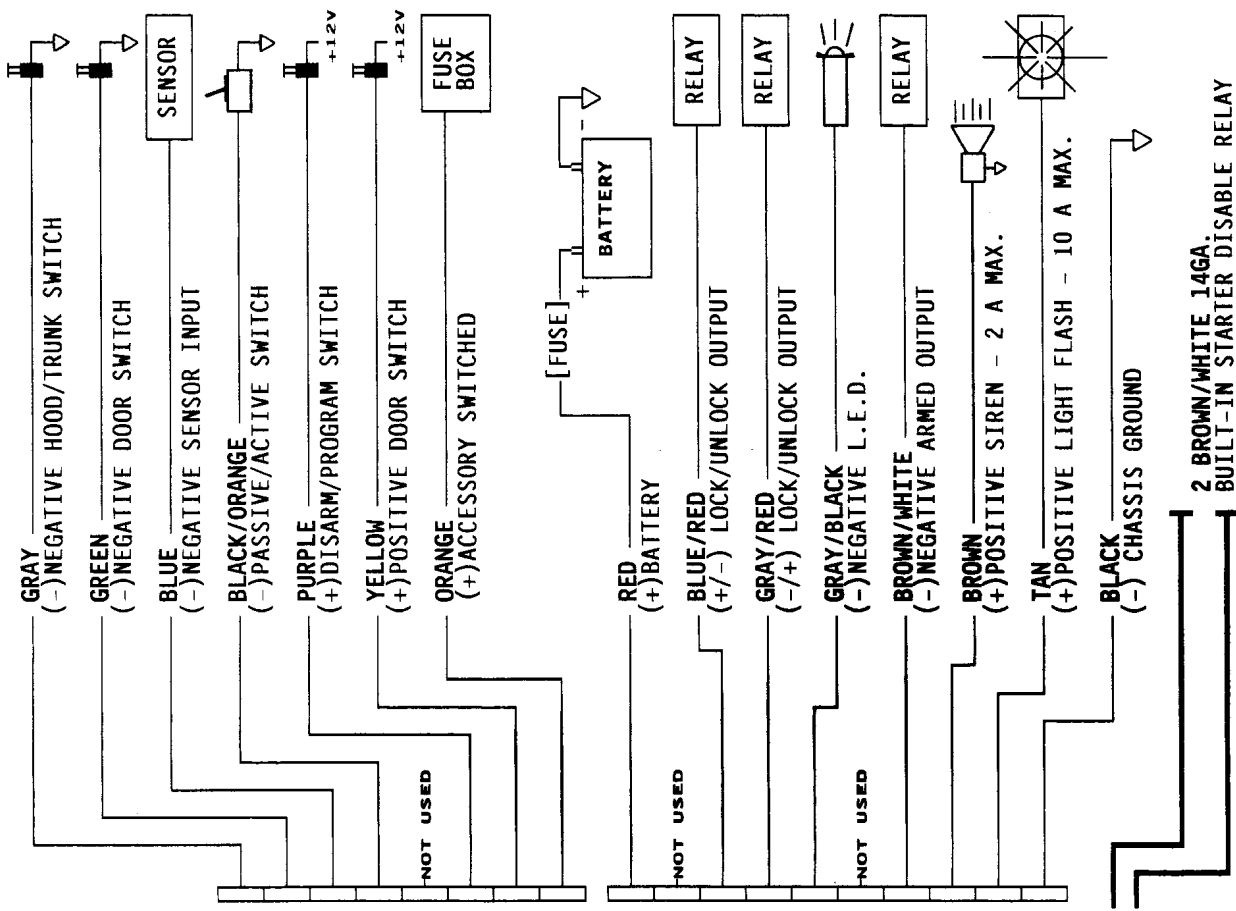
SYSTEM WILL SOUND FOR 30 SECONDS, THEN RESET AND STAY ARMED.

DASH LED WILL FLASH THREE TIMES WITH A LONG PAUSE BETWEEN FLASHES.

DISARM SYSTEM,

- SIREN CHIRPS THREE TIMES
- LIGHTS FLASH THREE TIMES (INTRUSION NOTICE)
- DASH L.E.D. STOPS FLASHING

ALARM MAIN WIRING DIAGRAM



2 BROWN/WHITE 14GA.
BUILT-IN STARTER DISABLE RELAY