Appendix A

Toyota Wiring Diagram Symbols

\bigcirc	ANALOG METER Current flow activates a magnetic coil which causes a needle to move, thereby providing a relative display against a background calibration.	+	DIODE A semiconductor which allows current flow in only one direction.
	ANALOG SPEED SENSOR Uses magnetic impulses to open and close a switch to create a signal for activation of other components.	4	DIODE, ZENER A diode which allows current flow in one direction but blocks reverse flow only up to a specific voltage. Above that potential, it passes the excess voltage. This acts as a simple voltage regulator.
┿	BATTERY Stores and converts chemical energy into electrical energy. Provides DC current for the auto's various electrical circuits.		DISTRIBUTOR (I.I.A.) Channels high-voltage current from the ignition coil to the individual spark plugs.
	BIMETALLIC THERMOSWITCH An automatic switch which opens or closes, depending on temperature.		DOUBLE-THROW SWITCH A switch which continuously passes current through one set of contacts or the other.
	CAPACITOR (Condenser) A small holding unit for temporary storage of electrical current. Capacitors with a ground connection are frequently called Condensers.	Ş	FUSE A thin metal strip which burns through when too much current flows through it, thereby stopping current flow and protecting a circuit from damage.
Ĩ	CIGARETTE LIGHTER An electric resistance heating element.	\langle	FUSIBLE LINK A heavy-gauge wire placed in high amperage circuits which burns through on overloads, thereby protecting the circuit.
Å	CIRCUIT BREAKER Basically a reusable fuse, a circuit breaker will heat and open if too much current flows through it. Some units automatically reset when cool, others must be manually reset.	Ļ	GROUND The point at which wiring attaches to the chassis, thereby providing a return path for an electrical circuit; without a ground, current cannot flow.
	CONNECTORS Male connectors typically have extended pins which engage sockets in the female connector. Toyota wiring diagrams show harness connectors from the open end.	Single Filament	HEADLAMPS Current flow causes a headlamp filament to heat up and cast light. A headlamp may have either a single filament or a double filament.
Female Male Side Side	CONNECTOR, HARNESS TO HARNESS A connector in the wiring harness which joins two harness sections. This symbol refers to pin 2 of connector R.	Double Filament	
° °	CONNECTOR, TO JUNCTION BOX A connection of a wire harness to a junction block. This symbol refers to pin 6 of connector C at junction block 1.	07	HORN An electric device which sounds a loud audible signal.
FUEL	DIGITAL METER Current flow activates one or many LED's, LCD's or fluorescent displays, which provide a relative or digital display.		IGNITION COIL Converts low-voltage DC current into high-voltage ignition current for firing the spark plugs.

	IGNITION SWITCH A key operated switch with several positions which allow various circuits to become operational, including the primary ignition circuit.		SENSOR (Thermistor) A resistor which varies its resistance with temperature.
-	LAMP Current flow through a filament causes a lamp to heat up and cast light.	þ	SHORT PIN Used to provide an unbroken connection within a junction block.
	LED (LIGHT EMITTING DIODE) Upon current flow, these diodes cast light without emitting the heat of a comparable lamp. Used in instrument displays.		SOLENOID An electromagnetic coil which creates its own mechanical movement or force upon current flow.
Normally Open	MANUAL SWITCH Opens and closes circuits, thereby stopping or allowing current flow.		SPEAKER An electromechanical device which creates sound waves from current flow.
Normally Closed		ر روج ا	SWITCH, WASHER TIMER SWITCH Controls the intermittent operation of the windshield washer jets.
	MOTOR A power unit which converts electrical energy into mechanical energy or rotary motion.		SWITCH, WIPER PARK Automatically returns wipers to the stop position when the wiper switch is turned off.
Normally Closed	RELAY Basically, an electrically operated switch which may be normally closed or normally open. Current flow through a small coil creates a magnetic field which either opens or closes an attached switch.	-444-	TAPPED RESISTOR A resistor which supplies two or more different non-adjustable resistance values.
Normally Open			TRANSISTOR A solid-state device typically used as an electronic relay; stops or passes current depending on the applied voltage at "base."
	RELAY DOUBLE THROW Not Connected A relay which passes current through one set of contacts or the other. WIRI Wire diagonal Wire diagonal	WIRES Wires are always drawn as straight lines on wiring diagrams. Crossed wires, without a black dot at	
-~~-	RESISTOR An electrical component with a fixed resistance, placed in a circuit to reduce voltage to a specific value.	Spliced	the junction, are not joined; crossed wires with a black dot at the junction, are spliced (joined) connections.
>//\	RESISTOR, VARIABLE or RHEOSTAT A controllable resistor with a variable rate of resistance. Also called a potentiometer or rheostat.		