SYSTEM DESCRIPTION

1. GENERAL

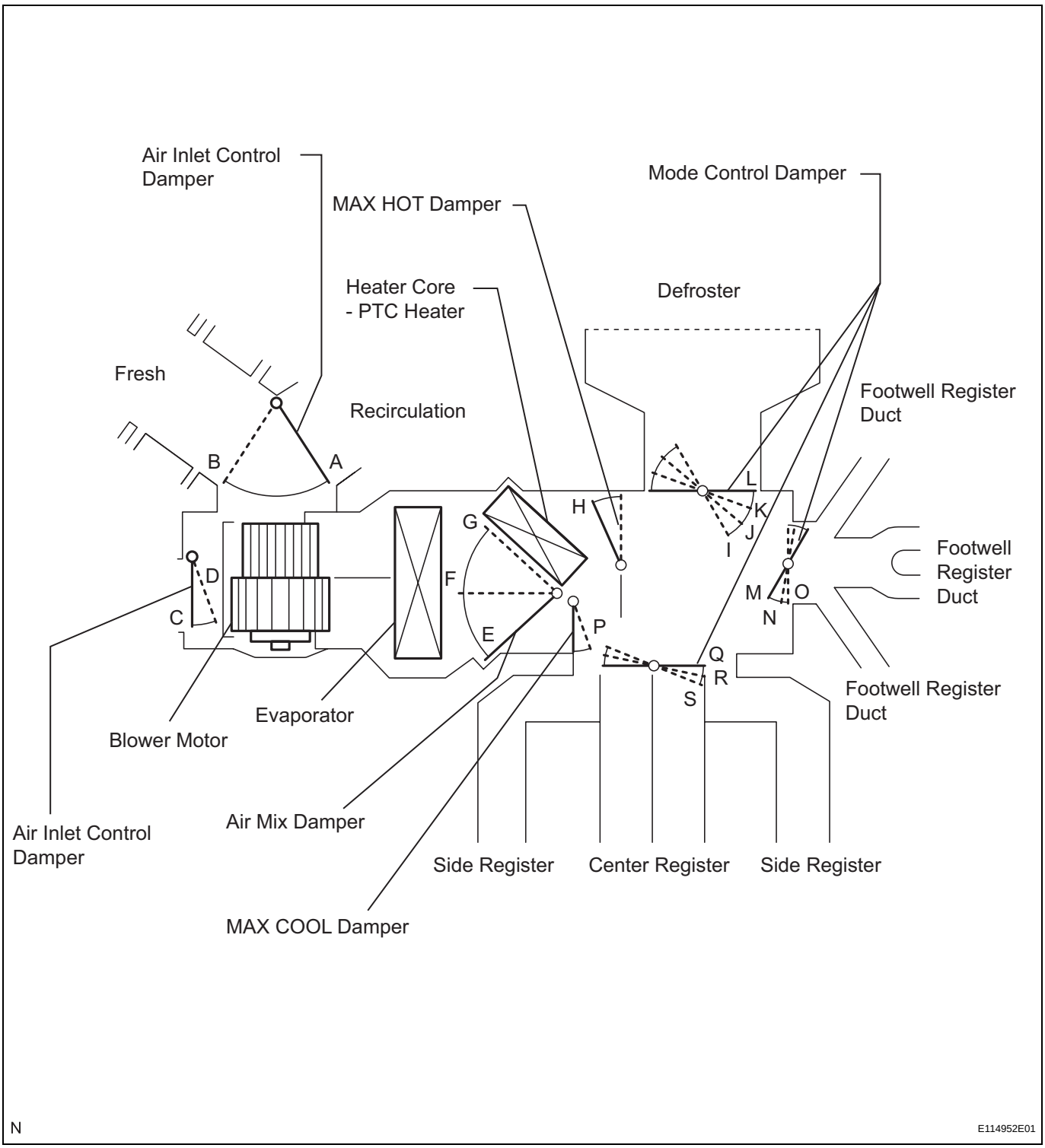
(a) Air Conditioning Unit

- The evaporator body has been coated with a type of resin that contains an antibacterial agent in order to minimize foul odor and the propagation of bacteria.
- An MS (Multi-tank, Super-slim) structure evaporator consists of the top and bottom tanks and inner fin.
- A compact, lightweight, and highly efficient straight flow (full-path flow) aluminum heater core is used.
- A 2-way flow type air conditioning unit changes the 2-way flow operation if specified conditions are met. Under 2-way flow operation, the system introduces external air and internal air simultaneously as follows: 1) warm internal air is discharged to the foot area; and 2) fresh, dry, external air is discharged to the upper area. Thus, it realizes both excellent heating performance and demisting performance.
- The PTC (Positive Temperature Coefficient) heater contains electrodes that are interposed with a PTC element, to which current is applied in order to warm the air that passes through the fin.

(b) Other Equipment

- The compressor is a continuously variable capacity type in which its capacity varies in accordance with the cooling load of the air conditioner.
- The A/C amplifier assembly is equipped with a self-diagnosis function. If there is a malfunction in the system, it stores DTC(s) in its memory.
- When the A/C amplifier assembly uses the CAN communication line, necessary data is shared with the ECM.

2. MODE POSITION AND DAMPER OPERATION

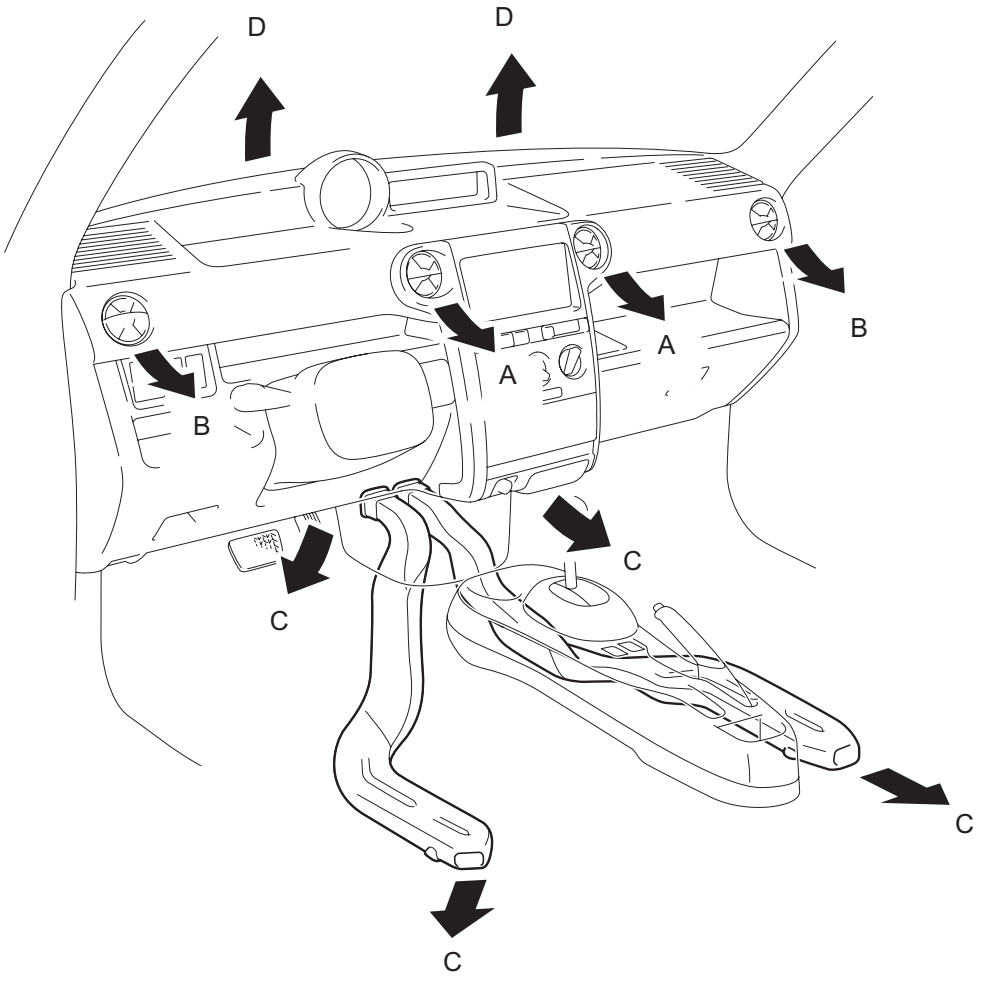


Control Damper	Control Position	Damper Position	Operation
Air Inlet Control Damper	FRESH	A, C	Brings in fresh air
	FRESH (During 2-way flow control)	A, D	Brings in fresh air and recirculates internal air
	RECIRCULATION	B, D	Recirculates internal air
Air Mix Control Damper	HOT TO COOL	E, F, G	Varies mixture ratio of fresh air and recirculation air in order to regulate temperature continuously from HOT to COLD

AC

Control Damper	Control Position	Damper Position	Operation
Mode Control Damper	FACE 	L, O, S	Air blows out of center register and side register
	BI-LEVEL 	L, N, R	Air blows out of center register, side register and footwell register duct
	FOOT 	K, M, Q	Air blows out of footwell register duct, and side register. In addition, air blows out slightly from center defroster.
	FOOT/DEF 	J, N, Q	Defrosts windshield through center defroster and side register, while air is also blown out from footwell register duct
	DEF 	I, O, Q	Defrosts windshield through center defroster and side register
MAX COOL Damper	MAX COOL	P	Operates during MAX COOL to improve maximum cooling performance
MAX HOT Damper	MAX HOT	H	Operates during MAX HOT to improve maximum heating performance

3. AIR OUTLETS AND AIRFLOW VOLUME



P

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		A	B	C	D
Air Outlet Mode		**Center Face**	**Side Face**	**Foot**	**Defroster**
FACE		○	○	-	-
BI-LEVEL		○	○	○	-
FOOT		MAX COOL only ○	○	◯	○

		A	B	C	D
Air Outlet Mode		**Center Face**	**Side Face**	**Foot**	**Defroster**
FOOT / DEF		MAX COOL only ○	○	◯	◯
DEF		MAX COOL only ○	○	-	◯

HINT:
The circle size (○) indicates the proportion of air flow volume.
There are 4 sizes.