

TOYOTA

SERVICE BULLETIN

TOYOTA MOTOR SALES, U.S.A., INC.

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| MODEL | ALL |

URETHANE ADHESIVE SEALANT FOR FIXED GLASS INSTALLATION

This bulletin is a supplement to the previous 1986 Windshield Installation Procedure TSB, body number 032, Volume VIII, dated 08-22-86.

In order to comply with FMVSS 212 – Windshield Retention and FMVSS 216 – Roof Crush Resistance, the factory uses a Urethane adhesive sealant with bonded strength of not less than 40 kilograms per square centimeter or 569 pounds per square inch for certain bonded windshields and rear windows on Toyota vehicles.

A Urethane adhesive sealant of at least equivalent strength must be used to maintain these retention and roof crush standards when windshield glass replacements are performed by either the dealer or an outside glass shop.

Since the adhesive kits listed in Toyota Repair Manuals are not available in the USA, this bulletin is prepared in order to supply information regarding locally available equivalent materials. (See Note 3 on page 3.)

For more detailed application information, see the attached “Urethane Adhesive Sealant Applications for Toyota Models.”

Be sure to follow the sealant manufacturer’s instructions for best results.

Note: Rear Quarter windows on some models are bonded, however, the adhesive for these windows requires less bonding strength and therefore use of Butyl sealer is sufficient.

This bulletin is for information and clarification only. Existing Warranty policy and Flat Rate information have not been changed. Toyota is not responsible for problems that occur from usage of improper sealants that fail to meet Toyota specifications.

URETHANE ADHESIVE SEALANT FOR FIXED GLASS INSTALLATION (Cont'd)

URETHANE ADHESIVE SEALANT APPLICATION FOR TOYOTA MODELS

| MODEL | BODY | WINDSHIELD | REAR WINDOW | QUARTER WINDOW |
|-----------------------------------|----------------------------------|--------------------|--------------------|-----------------|
| Tercel 8608 to date | 2-Dr Sdn 3-Dr L/B 5-Dr Sdn | Urethane Bonded | | Butyl Bonded |
| Tercel 8208 to 8607 | 3-Dr L/B | Urethane Bonded | | |
| Tercel 8308 to date | 5-Dr Wgn | Urethane Bonded | | |
| Corolla FWD AE 8409 to 8707 | 4-Dr Sdn | Urethane Bonded | | |
| | 5-Dr L/B | Urethane Bonded | | Butyl Bonded |
| RWD AE 8409 to 8707 | 2-Dr S/C 2-Dr L/B | Urethane Bonded | | Butyl Bonded |
| FX Models 8608 to date | 3-Dr L/B | Urethane Bonded | | |
| AE 8708 to date | 2-Dr S/C | Urethane Bonded | Urethane Bonded | Butyl Bonded |
| | 4-Dr Sdn | Urethane Bonded | Urethane Bonded | |
| MR2 - AW 8501 to date | 2-Seater | Urethane Bonded | | Butyl Bonded |
| Celica - ST 8509 to date | 2-Dr S/C 2-Dr L/B | Urethane Bonded | Urethane Bonded | Butyl Bonded |
| Supra - MA70 8601 to date | 2-Dr L/B | Urethane Bonded | Urethane Bonded | Butyl Bonded |
| Camry - SV/CV 8409 to 8608 | 4-Dr Sdn 5-Dr L/B | Urethane Bonded | | Butyl Bonded |

URETHANE ADHESIVE SEALANT FOR FIXED GLASS INSTALLATION (Cont'd)

| MODEL | BODY | WINDSHIELD | REAR WINDOW | QUARTER WINDOW |
|-------------------------------|----------------|--------------------|--------------------|-----------------|
| Camry - SV 9-86 to date | 4-Dr Sdn | Urethane Bonded | | Bonded |
| | 5-Dr Wgn | Urethane Bonded | | Bonded |
| Cressida | 4-Dr Sdn | Urethane Bonded | Urethane Bonded | Butyl Bonded |
| MX 4-84 to date | 5-Dr Wgn | Urethane Bonded | | Butyl Bonded |
| Van - YR 9-83 to date | Pass Cargo | Urethane Bonded | | |
| Land Cruiser | 2-Dr H/T | | | |
| FJ All to date | 4-Dr Wgn | | | |
| Truck - RN/LN 9-83 to date | 4 x 2 4 x 4 | Urethane Bonded | | |
| 4Runner | All | Urethane Bonded | | Butyl Bonded |

Note: (1) All others that are not indicated use a conventional weatherstrip method.

- (2) The following urethane adhesive kits described in Toyota Repair Manuals are not available in the USA.

Adhesive Kits in Toyota Repair Manuals

P/N 08850-00070 32 to 59 degrees F (0 to 15 degrees C)
 08850-00080 59 to 95 degrees F (15 to 35 degrees C)
 08850-00090 95 to 113 degrees F (35 to 45 degrees C)

- (3) Locally available adhesives known to TMS/USA to date are:

- CUS Urethane Auto Glass Sealer by American Sure Seal
Bonding strength = 600 pounds per square in. (approximate)
- Super Fast Urethane by 3M Bonding strength = 1000 pounds per square in. (approximate)
- Unrest 212 by Kent Industries
Bonding strength = 600 pounds per square in. (approximate)
- Urethane E Auto Glass Sealer by Protective Treatment Inc.
Bonding strength = 600 pounds per square in. (approximate)

- (4) Quarter window replacement does not necessarily require the bonding strength provided by the above sealants. Use of butyl sealer is therefore sufficient for these windows.