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INTERNATIONAL
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SURFACE VEHICLE STANDARD

SAE J265

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Submitted for recognition as an American National Standard

(R) DIESEL FUEL INJECTOR ASSEMBLY—TYPES 8, 9, 10, AND 11

Foreword—This Document has also changed to comply with the new SAE Technical Standards Board format.

1. Scope—This SAE Standard specifies the dimensional requirements necessary for the mounting and interchangeability of four types of fuel injectors in diesel engines. Two of the types specified are flats-located injectors.

The location and dimensions of the fuel inlet, leak-off connections, and type of attachment are not defined since they may vary according to the particular application.

1.1 Field of Application—This document is applicable to nozzle holder types 8 and 10 of an unspecified means of angular location and flats-located types 9 and 11 with a 17.0 mm (nominal) shank diameter. The internal construction of the fuel injector remains optional with the manufacturer.

2. References

2.1 Related Publication—The following publication is provided for information purposes only and is not a required part of this document.

2.1.1 ISO PUBLICATION—Available from ANSI, 11 West 42nd Street, New York, NY 10036-8002.

ISO 3539—Road Vehicles—Injection Nozzle Holder with body, types 8 and 10, and injection nozzle holder with fixing flats, types 9 and 11

3. Dimensions and Tolerances—With the aid of detail enlargement "Z", Figures 1 and 2 illustrate the length and diameters of the nozzle, sealing washer, nozzle retaining nut, and the nozzle holder as related to the interface between the injector and the bore in the engine.

Note that two basic nozzle body diameters 7 and 9 mm are shown.

Dimensions and requirements not given in this document are left to the discretion of the manufacturer.

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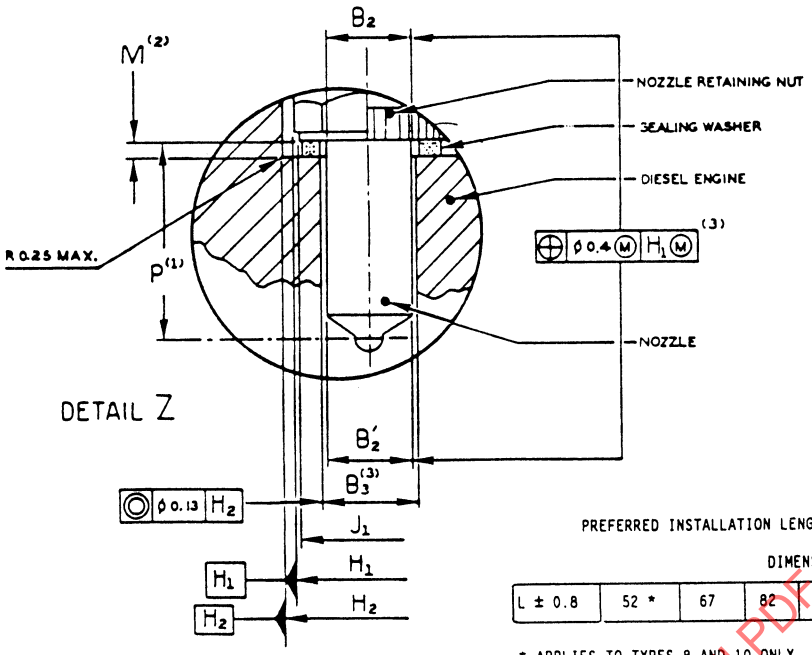

PREFERRED INSTALLATION LENGTHS

DIMENSIONS IN MM

L ± 0.8	52 *	67	82	97	112

* APPLIES TO TYPES 8 AND 10 ONLY

DIMENSIONS IN MM

NOZZLE HOLDER TYPES	H_1	H_2	H_3	B_2 ($B_2 > B_2'$)	B_2'	B_3(3)	J_1	M(2)	P(1)
8 AND 9	17.0 MAX	$17.1^{+0.1}_{0}$	16.9 MAX	9.2 MAX	$8.9^{+0.3}_{0}$	---	14.5 MIN	1.5 NOM	$20.0^{+0.7}_{0}$
10 AND 11				7.2 MAX	$6.9^{+0.3}_{0}$				

(1) Y-Y and the center of the nozzle tip radius on the nozzle axis which is generally the apex of orifice spray.
(2) With commercial tolerances (before compression).
(3) The determination of the diameter B_3 in the cylinder head is left to the manufacturer's choice. For that purpose the maximum value for the nozzle shank which is given as a result of the Maximum Material Principle (M) and the maximum tolerance value of the cylinder head hole must be taken into account. The clearance shall be kept to a minimum to facilitate nozzle cooling.

FIGURE 1—NOZZLE HOLDER WITH BODY TYPES 8 AND 10

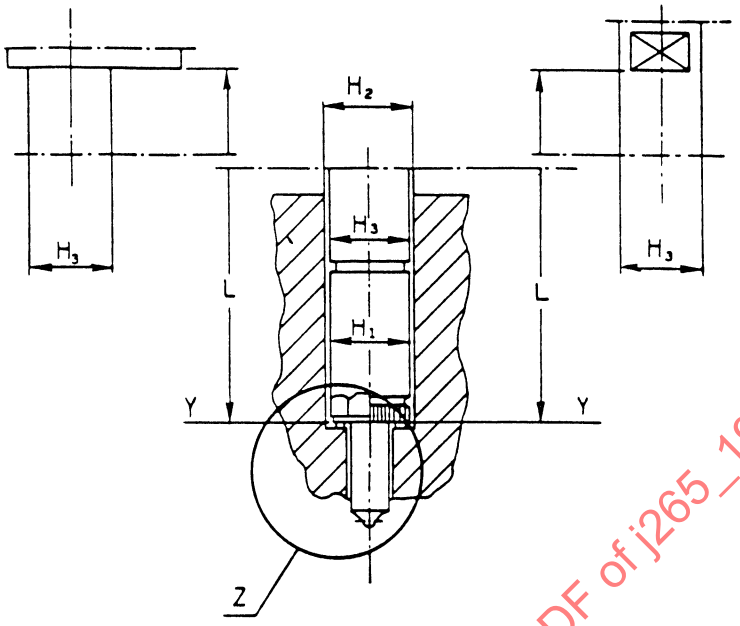

FIGURE 2—NOZZLE HOLDER WITH TWO FIZING FLATS TYPES 9 AND 11

4. Notes

4.1 Marginal Indicia—The change bar (l) located in the left margin is for the convenience of the user in locating areas where technical revisions have been made to the previous issue of the report. An (R) symbol to the left of the document title indicates a complete revision of the report.

PREPARED BY THE SAE DIESEL FUEL INJECTION EQUIPMENT STANDARDS COMMITTEE