ADAPTER – REDUCER / EXPANDER, FLARED TUBE TO BOSS
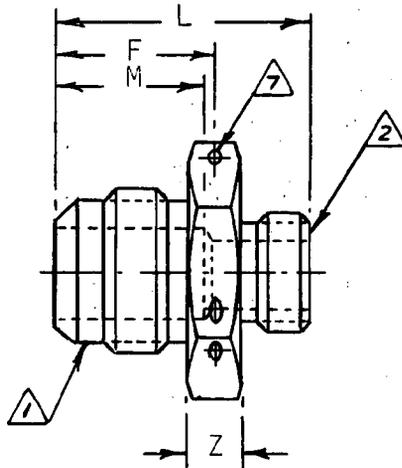
REDUCER ADAPTER

EXPANDER ADAPTER

±.010
.093
(TYP)

.035 ± .005 DIA.
THRU SIZE 05
.062 ± .005 DIA.
SIZE 06 & UP
(TYP.) 3 PLACES
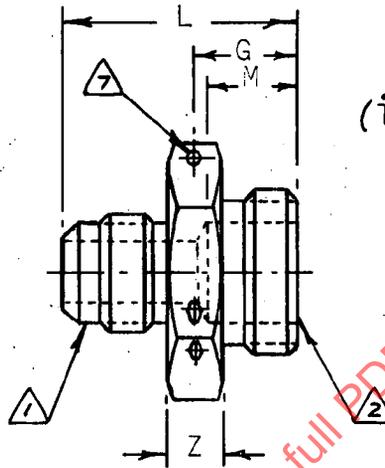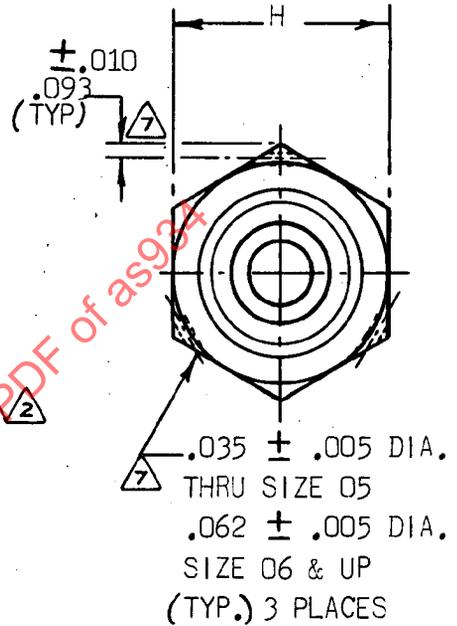
⚠1 FITTING END PER MS 33656 STYLE E FOR SPECIFIED TUBE SIZE

⚠2 BOSS END PER AS 930 FOR SPECIFIED SIZE

HEX SIZE IS DETERMINED BY THE LARGEST END FOR A GIVEN COMBINATION.

SEE EXAMPLE OF PART NUMBER.

EXPANDER ADAPTER: HEX SIZE AND HEX CHAMFER PER AS 930
REDUCER ADAPTER: HEX SIZE AND HEX CHAMFER PER MS 33656

Table 1 — L LENGTH ±.015

Reference dimensions by size:

SIZE	F ±.010	G ±.010 (REF.)	H HEX REF.	Z
03	.589	.470	.220	.625
04	.667	.517	.235	.688
05	.667	.517	.235	.750
06	.681	.525	.250	.813
08	.782	.565	.250	1.000
10	.914	.596	.312	1.125
12	1.051	.667	.375	1.375
16	1.098	.667	.375	1.625
20	1.145	.667	.375	1.875
24	1.270	.698	.437	2.125
32	1.551			2.750

L LENGTH matrix (rows = TUBE END SIZE, columns = BOSS END SIZE):

TUBE \ BOSS	02	03	04	05	06	08	10	12	16	20	24	32
02	—	1.028	1.083	1.083	1.098	1.138	1.200	1.303	1.303	1.303	1.303	1.365
03	1.059	—	1.114	1.114	1.129	1.169	1.231	1.334	1.334	1.334	1.334	1.396
04	1.145	1.145	—	1.185	1.200	1.240	1.302	1.405	1.405	1.405	1.405	1.467
05	1.145	1.145	1.185	—	1.200	1.240	1.302	1.405	1.405	1.405	1.405	1.467
06	1.166	1.166	1.206	1.206	—	1.246	1.308	1.411	1.411	1.411	1.411	1.473
08	1.267	1.267	1.307	1.307	1.307	—	1.409	1.512	1.512	1.512	1.512	1.574
10	1.430	1.430	1.470	1.470	1.470	1.510	—	1.613	1.613	1.613	1.613	1.675
12	1.599	1.599	1.639	1.639	1.639	1.679	1.679	—	1.719	1.719	1.719	1.781
16	1.646	1.646	1.686	1.686	1.686	1.726	1.726	1.726	—	1.766	1.766	1.828
20	1.693	1.693	1.733	1.733	1.733	1.773	1.773	1.813	1.813	—	1.813	1.875
24	1.818	1.818	1.858	1.858	1.858	1.898	1.898	1.938	1.938	1.938	—	2.000
32	2.130	2.130	2.170	2.170	2.170	2.210	2.210	2.250	2.250	2.250	2.250	—

Table 2 — M DRILL DEPTH ±.015

(rows = TUBE END SIZE, columns = BOSS END SIZE):

TUBE \ BOSS	02	03	04	05	06	08	10	12	16	20	24	32
02	—	.435	.480	.460	.455	.470	.505	.570	.505	.435	.365	.295
03	.555	—	.495	.480	.475	.490	.525	.590	.520	.455	.385	.310
04	.630	.645	—	.490	.485	.500	.535	.600	.535	.465	.395	.325
05	.610	.630	.640	—	.505	.515	.550	.620	.550	.485	.415	.340
06	.615	.630	.645	.660	—	.540	.575	.640	.575	.505	.435	.385
08	.685	.705	.715	.735	.755	—	.560	.625	.555	.490	.420	.345
10	.825	.840	.850	.870	.895	.875	—	.645	.575	.505	.440	.365
12	.985	.975	.985	1.005	1.025	1.010	1.025	—	.590	.520	.450	.375
16	.935	.950	.965	.980	1.005	.990	1.005	.980	—	.580	.510	.440
20	.915	.930	.945	.960	.985	.970	.985	1.000	1.060	—	.540	.465
24	.970	.990	1.000	1.020	1.040	1.025	1.040	1.055	1.115	1.145	—	.525
32	1.145	1.165	1.175	1.195	1.215	1.200	1.220	1.230	1.295	1.320	1.380	—