

**NOTE:** The "L" dimension is the height of the installed stud at max grip. The height of the stud will increase if it is installed into thinner material. To calculate "actual L" use this formula: max grip - actual grip + L = "actual L"

All dimensions are in inches.

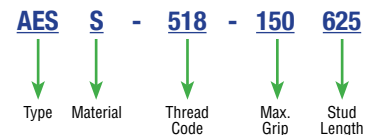
Thread Size	Grip Code	Grip Range	Stud Length "L" Nom. (at Max. Grip)			A ±.020	B ±.015	C Nom.	ØD Max.	M Ref.	Hole Size In Sheet	
			Part Number								+.006	-.000
#6-32	80	.020 - .080	.500	.625	.750	.490	.390	.030	.265	.375	.266	
			AESS-632-80-500	AESS-632-80-625	AESS-632-80-750							
			.450	.575	.700							
#6-32	130	.080 - .130	.450	.575	.700	.540	.390	.030	.265	.375	.266	
			AESS-632-130-450	AESS-632-130-575	AESS-632-130-700							
			.500	.625	.750							
#8-32	80	.020 - .080	.500	.625	.750	.490	.390	.030	.265	.375	.266	
			AESS-832-80-500	AESS-832-80-625	AESS-832-80-750							
			.450	.575	.700							
#8-32	130	.080 - .130	.450	.575	.700	.540	.390	.030	.265	.375	.266	
			AESS-832-130-450	AESS-832-130-575	AESS-832-130-700							
			.500	.625	.750							
#10-24	130	.020 - .130	.500	.625	.750	.545	.415	.030	.296	.385	.297	
			AESS-1024-130-500	AESS-1024-130-625	AESS-1024-130-750							
			.405	.530	.655							
#10-24	225	.130 - .225	.405	.530	.655	.655	.415	.030	.296	.385	.297	
			AESS-1024-225-405	AESS-1024-225-530	AESS-1024-225-655							
			.500	.625	.750							
#10-32	130	.020 - .130	.500	.625	.750	.545	.415	.030	.296	.385	.297	
			AESS-1032-130-500	AESS-1032-130-625	AESS-1032-130-750							
			.405	.530	.655							
#10-32	225	.130 - .225	.405	.530	.655	.655	.415	.030	.296	.385	.297	
			AESS-1032-225-405	AESS-1032-225-530	AESS-1032-225-655							
			.625	.8125	1.000							
1/4-20	165	.027 - .165	.625	.8125	1.000	.670	.500	.030	.390	.470	.391	
			AESS-420-165-625	AESS-420-165-8125	AESS-420-165-1000							
			.530	.7175	.905							
1/4-20	260	.165 - .260	.530	.7175	.905	.770	.500	.030	.390	.470	.391	
			AESS-420-260-530	AESS-420-260-7175	AESS-420-260-905							
			.625	.875	1.125							
5/16-18	150	.027 - .150	.625	.875	1.125	.805	.685	.035	.530	.585	.531	
			AESS-518-150-625	AESS-518-150-875	AESS-518-150-1125							
			.508	.713	.963							
5/16-18	312	.150 - .312	.508	.713	.963	.920	.685	.035	.530	.540	.531	
			AESS-518-312-463	AESS-518-312-713	AESS-518-312-963							
			.750	1.000	1.250							
3/8-16	150	.027 - .150	.750	1.000	1.250	.805	.685	.035	.530	.585	.531	
			AESS-616-150-750	AESS-616-150-1000	AESS-616-150-1250							
			.508	.838	1.088							
3/8-16	312	.150 - .312	.508	.838	1.088	.920	.685	.035	.530	.540	.531	
			AESS-616-312-588	AESS-616-312-838	AESS-616-312-1088							

NOTE: The standard is assembled with an AEL insert but can also be assembled with an AEK or an AEH insert (see page 13).

## MATERIAL & FINISH SPECIFICATIONS

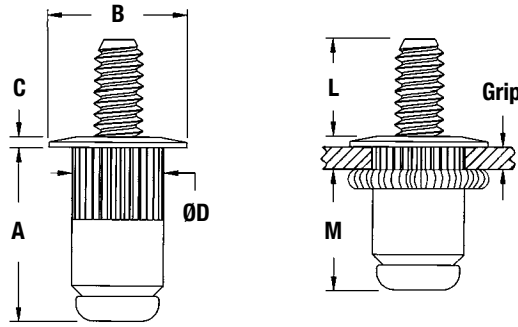
Type	Threads	Material	Standard Finish
AES	Unified, 2A per ASME B1.1 Metric, 6g per ASME B1.13M	Insert - Low Carbon Steel, C-1008 or equivalent Stud - Heat-treated medium carbon steel	Zinc Yellow Plate per ASTM B 633, Fe/Zn 8, Type II

### Part Number Designation



No finish code for standard finish zinc yellow.

SEE PAGE 32 FOR MORE DETAIL



**NOTE:** The "L" dimension is the height of the installed stud at max grip. The height of the stud will increase if it is installed into thinner material. To calculate "actual L" use this formula: max grip - actual grip + L = "actual L"

All dimensions are in millimeters.

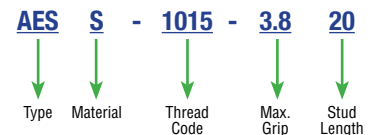
Thread Size x Pitch	Grip Code	Grip Range	Stud Length "L" Nom. (at Max. Grip)			A ±0.51	B ±0.38	C Nom.	ØD Max.	M Ref.	Hole Size In Sheet +0.15
			Part Number								
M4 x 0.7	2.0	0.5 - 2.0	12	15	20	12.45	9.91	0.76	6.73	9.53	6.75
			AESS-470-2.0-12.0	AESS-470-2.0-15.0	AESS-470-2.0-20.0						
			10.7	13.7	18.7						
M4 x 0.7	3.3	2.0- 3.3	AESS-470-3.3-10.7	AESS-470-3.3-13.7	AESS-470-3.3-18.7	13.72	9.91	0.76	6.73	9.53	6.75
			12	15	20						
			AESS-580-3.3-12.0	AESS-580-3.3-15.0	AESS-580-3.3-20.0						
M5 x 0.8	3.3	0.5 - 3.3	9.6	12.6	17.6	13.85	10.54	0.76	7.52	9.78	7.6
			AESS-580-5.7-9.6	AESS-580-5.7-12.6	AESS-580-5.7-17.6						
			15	20	25						
M6 x 1	4.2	0.7 - 4.2	12.6	17.6	22.6	17.02	12.7	0.76	9.91	11.94	10
			AESS-610-4.2-15.0	AESS-610-4.2-20.0	AESS-610-4.2-25.0						
			16	22	28						
M8 x 1.25	3.8	0.7 - 3.8	13	17.9	23.9	20.45	17.4	0.89	13.46	14.86	13.5
			AESS-8125-3.8-16.0	AESS-8125-3.8-22.0	AESS-8125-3.8-28.0						
			20	25	30						
M10 x 1.5	3.8	0.7 - 3.8	17	20.9	25.9	20.45	17.4	0.89	13.46	14.86	13.5
			AESS-1015-3.8-20.0	AESS-1015-3.8-25.0	AESS-1015-3.8-30.0						
			20	25	30						
M10 x 1.5	7.9	3.8 - 7.9	17	20.9	25.9	23.37	17.4	0.89	13.46	13.72	13.5
			AESS-1015-7.9-5.9	AESS-1015-7.9-20.9	AESS-1015-7.9-25.9						
			16	22	28						

NOTE: The standard is assembled with an AEL insert but can also be assembled with an AEK or an AEH insert.

## MATERIAL & FINISH SPECIFICATIONS

Type	Threads	Material	Standard Finish
AES	Unified, 2A per ASME B1.1 Metric, 6g per ASME B1.13M	Insert - Low Carbon Steel, C-1008 or equivalent Stud - Heat-treated medium carbon steel	Zinc Yellow Plate per ASTM B 633, Fe/Zn 8, Type II

### Part Number Designation



No finish code for standard finish zinc yellow.

SEE PAGE 32 FOR MORE DETAIL