

CHANGES FROM MMPDS-03 TO MMPDS-04

Chapter	Alloy or Fastener	Heat Treatment	Product Form	Comments
Chapter 3	2013	T6511	Extrusion	Addition of Poisson's Ratio & Shear Modulus
Chapter 3	2013	T6511	Extrusion	SCC Info for 2013-T6511 Al Extruded Shapes
Chapter 3	2024	T351		Showing Orientation on Derived Properties
Chapter 3	2027	T3511	Extrusion	Mechanical Properties for 2027-T3511 Al Alloy Extrusions
Chapter 3	2056	T3	Sheet	A- and B-basis Mechanical Properties for Alclad 2056-T3 Al sheet
Chapter 3	2124	T851	Plate	Reanalysis of FCP data presented in Ch 3
Chapter 3	2519	T87		Showing Orientation on Derived Properties
Chapter 3	5083	H321	Plate	AMS-QQ-A-250/6 revised. H321 superseded to ASTM B928
Chapter 3	5083	H323	Plate	AMS-QQ-A-250/6 revised. H323 cancelled without supersedure
Chapter 3	5083	H343	Plate	AMS-QQ-A-250/6 revised. H343 cancelled without supersedure
Chapter 3	5456	H321	Plate	AMS-QQ-A-250/9 revised. H321 superseded to ASTM B928
Chapter 3	7010	T7451		Showing Orientation on Derived Properties
Chapter 3	7010	T7651		Showing Orientation on Derived Properties
Chapter 3	7040	T7451		Showing Orientation on Derived Properties
Chapter 3	7049	T7351		Showing Orientation on Derived Properties
Chapter 3	7050	T7452	Plate	Legacy Alloy Evaluation of 7050-T7451 Aluminum Plate
Chapter 3	7050	T7451	Plate	Update of Plane Strain Fracture Toughness Properties for 7050-T7451 Plate
Chapter 3	7050	T7451	Plate	Reanalysis of FCP data presented in Ch 3
Chapter 3	7075	T73511	Extrusion	Reduced Ratios for 7075-T73511 Extrusions
Chapter 3	7075	T6	Sheet	Reanalysis of FCP data presented in Ch 3
Chapter 3	7075	T7351	Plate	Reanalysis of FCP data presented in Ch 3
Chapter 3	7075	T7651		Showing Orientation on Derived Properties
Chapter 3	7075	T62		Showing Orientation on Derived Properties
Chapter 3	7075	T73		Showing Orientation on Derived Properties
Chapter 3	7075	T7351		Showing Orientation on Derived Properties
Chapter 3	7075	T651		Showing Orientation on Derived Properties
Chapter 3	7075	T62		Showing Orientation on Derived Properties
Chapter 3	7085	T7452	Forgings	Typical Stress-Strain Curves for 7085-T7452 Aluminum Alloy Hand Forgings
Chapter 3	7085	T7651	Plate	Add C rating in ST direction
Chapter 3	7085	T7651	Plate	Add maximum tension stress of 26 ksi for 4-7 inch thick plate
Chapter 3	7085	T7452	Forging	Design Allowables for 7085-T7452 Hand Forgings
Chapter 3	7085	T7651	Plate	Fatigue Data for 7085-T7651 Plate
Chapter 3	7140	T7451	Plate	CTE and Specific heat for 7140-T7451 Plate
Chapter 3	7140	T7451	Plate	CTE and Specific heat for 7140-T7451 Plate
Chapter 3	7449	T79511		Mechanical Properties for 7449-T79511 Aluminum Alloy Heavy Extrusions (MTG)
Chapter 3	7449	T7951	Plate	A- and B-Basis Mechanical Design Properties for 7449-T7951 Aluminum Alloy Plate
Chapter 3	7475	T7351	Plate	Reanalysis of FCP data presented in Ch 3
Chapter 3	7475	T7351		Showing Orientation on Derived Properties
Chapter 2	15-5PH	H1025	Bar	Mechanical Properties for 15-5PH, H1025, Steel Bar, Type 1 (VAR) and Type 2 (ESR) (MTG)
Chapter 3	A357.0		Casting	Correction to Section on A357/F357 Aluminum Alloy Castings
Chapter 3	F357.0		Casting	Correction to Section on A357/F357 Aluminum Alloy Castings
Chapter 6	Inco 706			Showing Orientation on Derived Properties
Chapter 6	Inco 718		Forging	Reanalysis of FCP data presented in Ch 6
Chapter 6	Inco 718			Reanalysis of FCP data presented in Ch 6
Chapter 6	Inco X-750			Showing Orientation on Derived Properties

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Chapter 7	MP159		Bar	A- and B-Basis Properties for MP35N Bar for Diameters Up to 1.75 Inches
Chapter 7	MP35N		Bar	A- and B-Basis Properties for MP35N Bar for Diameters Up to 1.75 Inches
Chapter 8	MS20600M			Added footnote, Avg yield value reduced to match ultimate load
Chapter 8	MS20601M			Added footnote, Avg yield value reduced to match ultimate load
Chapter 2	PH13-8Mo	H1000	Bar	Allvac Supertough 13-8 design allowables and stress strain curves added
Chapter 2	PH13-8Mo	H1000	Forging	Allvac Supertough 13-8 design allowables and stress strain curves added
Chapter 2	PH13-8Mo	H1000	Extrusion	Allvac Supertough 13-8 design allowables and stress strain curves added
Chapter 5	Ti-5Al-2.5Sn	MA	Sheet	Reanalysis of FCP data presented in Ch 5
Chapter 5	Ti-6Al-4V			Revision of Ti-6Al-4V Manufacturing Considerations for Single Melt
Chapter 5	Ti-6Al-4V			Revision of Ti-6Al-4V Manufacturing Considerations Section
Chapter 5	Ti-6Al-4V	MA	Plate	Reanalysis of FCP data presented in Ch 5
Chapter 5	Ti-6Al-4V			Showing Orientation on Derived Properties
Chapter 5	Ti-6Al-4V	Annealed	Bar	Evaluation of Legacy Ti-6Al-4V bar
Chapter 2	assorted			Reword A-Basis Footnote for Condition where S-basis is Less Than Calculated T99
Chapter 3	assorted			Reword A-Basis Footnote for Condition where S-basis is Less Than Calculated T99
Chapter 4	assorted			Reword A-Basis Footnote for Condition where S-basis is Less Than Calculated T99
Chapter 5	assorted			Reword A-Basis Footnote for Condition where S-basis is Less Than Calculated T99
Chapter 6	assorted			Reword A-Basis Footnote for Condition where S-basis is Less Than Calculated T99
Chapter 7	assorted			Reword A-Basis Footnote for Condition where S-basis is Less Than Calculated T99
Chapter 8	assorted			Definition of Knife-Edge Conditions in MMPDS
Chapter 9	assorted			Reconsideration of Chronology of Footnotes being Added for Issue/revised
Chapter 9	assorted			Reconsideration of Applicable Range of Thickness for Stress-Strain Curves and Effect of Temp Curves
Chapter 9	assorted			Confirmation of Design Properties for Legacy Alloys
Chapter 9	assorted			Reword A-Basis Footnote for Condition where S-basis is Less Than Calculated T99
Chapter 9	assorted			Revision of Footnote in Table 9.2.3.2 on Primary Grain Direction for Titanium Alloys
Chapter 9	assorted			Editorial updated of Testing Standard for CTE
Chapter 9	assorted			Use of Transformed with Backoff
Chapter 9	assorted			Inclusion of Fatigue Properties of Materials with As-Used Surfaces
Chapter 9	assorted			Redefined variables. Refer to Item 06-03. corrected typos
Chapter 9	assorted			Corrected definitions and equations for Problem III
Chapter 9	assorted			Added new Table for T90
Chapter 9	assorted			Correcting for Bias in the Mean of Log and power Transformed Data
Chapter 9	assorted			Treatment of Outliers when developing static design allowables
Chapter 9	assorted			Example problems in Chapter 9