



Designation: A 627 – 9503

Standard Specification Test Methods for Homogeneous Tool-Resisting Tool-Resisting Steel Bars, Flats, and Shapes for Security Applications Detention and Correctional Facilities¹

This standard is issued under the fixed designation A 627; the number immediately following the designation indicates the year of original adoption or, in the case of revision, the year of last revision. A number in parentheses indicates the year of last reapproval. A superscript epsilon (ε) indicates an editorial change since the last revision or reapproval.

This standard has been approved for use by agencies of the Department of Defense.

1. Scope

~~1.1 This specification covers~~

~~1.1 These test methods cover requirements for the performance characteristics including conventional mechanical tests, simulated service tests and testing equipment for determining the performance characteristics of homogeneous tool-resisting steel bars various types and shapes of steels designated for use in detention and correctional facilities as fixed barriers to prevent egress and to control passage.~~

~~1.2 It is the possibility intent of severing or penetrating this material by cutting means other than those described herein. This material can be severed with tungsten/carbide coated these test methods to help ensure that opening assemblies such as detention security windows, grilles, bar grating, and other physical barriers incorporating steel bars perform at or tipped saws.~~

~~1.2 Three tests, describing above minimum performance characteristics required acceptable levels for bars control of different diameters covered by this specification are: (1) drop-weight test, (2) cutting test, passage to unauthorized or secure areas, for confinement of inmates and (3) to delay or frustrate escape attempts. To meet the intent of these test methods, opening assemblies must perform to grade requirements shown in Tables X1.1 and X1.2 in Appendix X1.~~

~~1.3 These test methods apply primarily to the steels used as essential components of detention security windows, grilles, bar grating, and so forth, in opening assemblies enclosing or separating secure areas of detention/correctional facilities.~~

~~1.34 The values stated in inch-pound units are to be regarded as standard. The SI values given in parentheses are for information only.~~

~~1.5 This standard updates and combines two previous standards, ASTM Specifications A 627-95 and A 629-94, establishing new security grades and time durations.~~

~~1.6 This standard does not purport to address all of the safety concerns, if any, associated with its use. It is the responsibility of the user of this standard to establish appropriate safety and health practices and determine the applicability of regulatory limitations prior to use.~~

2. Referenced Documents

2.1 ASTM Standards:

C 39/C 39M Test Method for Compressive Strength of Cylindrical Concrete Specimens²

¹ This specification is under the jurisdiction of ASTM Committee F33 on Detention and Correctional Facilities and is the direct responsibility of Subcommittee F33.02 on Physical Barriers.

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