

SBC

The Saudi Code for Cold-Formed
Steel Light-Frames

SBC 309 - CC

Code & Commentaries



2024

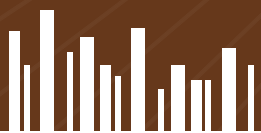


TABLE OF CONTENTS

CHAPTER 1 —GENERAL	1
1.1 —SCOPE	1
1.2 —DEFINITIONS	2
1.3 —MATERIAL	6
1.4 —CORROSION PROTECTION	7
1.5 —PRODUCTS	8
1.6 —REFERENCE DOCUMENTS	9
CHAPTER 2 —DESIGN	14
2.1 —GENERAL	14
2.2 —FLOOR AND CEILING FRAMING	19
2.3 —WALL FRAMING	22
2.4 —ROOF FRAMING.....	33
2.5 —LATERAL FORCE-RESISTING SYSTEMS.....	35
CHAPTER 3 —INSTALLATION	62
3.1 —GENERAL	62
3.2 —MATERIAL CONDITION	62
3.3 —STRUCTURAL FRAMING	62
3.4 —CONNECTIONS.....	66
3.5 —MISCELLANEOUS.....	66
CHAPTER 4 —QUALITY CONTROL AND QUALITY ASSURANCE.....	71
4.1 —GENERAL	71
4.2 —QUALITY CONTROL PROGRAMS.....	72
4.3 —QUALITY CONTROL DOCUMENTS	73
4.4 —QUALITY ASSURANCE AGENCY DOCUMENTS	74
4.5 —INSPECTION PERSONNEL	75
4.6 —INSPECTION TASKS	76
4.7 —NONCONFORMING MATERIAL AND WORKMANSHIP	78
CHAPTER 5 —TRUSSES	84
5.1 —GENERAL	84
5.2 —TRUSS RESPONSIBILITIES.....	84
5.3 —LOADING	84
5.4 —TRUSS DESIGN	84
5.5 —QUALITY CRITERIA FOR STEEL TRUSSES	92
5.6 —TRUSS INSTALLATION	92
5.7 —TEST-BASED DESIGN.....	93
CHAPTER 6 —TESTING.....	98
6.1 —GENERAL	98
6.2 —TRUSS COMPONENTS AND ASSEMBLIES.....	98
APPENDIX A —CONTINUOUSLY BRACED DESIGN FOR DISTORTIONAL BUCKLING RESISTANCE	99
A.1	99
A.2	99
A.3	99
APPENDIX B —TEST METHODS FOR TRUSS COMPONENTS AND ASSEMBLIES	103

B.1 — COMPONENT STRUCTURAL PERFORMANCE LOAD TEST.....103
B.2 — FULL-SCALE CONFIRMATORY LOAD TEST104
B.3 — FULL-SCALE STRUCTURAL PERFORMANCE LOAD TEST.....106
SYMBOLS 109
REFERENCES.....117