

S.W. 36th STREET

S.W. 30th AVE.

EXIST. BLDG #1

TRUCK COURT

T.P.A.

# Light Steel Framing

## SPECIFICATION FOR LIGHT WEIGHT STEEL FRAMING

### ASTM STANDARDS:

- 1) STANDARD SPECIFICATION FOR STEEL SHEET, ZINC-COATED (GALVANIZED) BY THE HOT-DIP PROCESS.
- 2) STANDARD SPECIFICATION FOR THE APPLICATION AND FINISHING OF GYPSUM BOARD.
- 3) STANDARD SPECIFICATION FOR THE INSTALLATION OF INTERIOR LATHING, FURRING.
- 4) STANDARD SPECIFICATION FOR THE APPLICATION OF INTERIOR GYPSUM PLASTER.
- 5) STANDARD SPECIFICATION FOR THE APPLICATION OF PORTLAND CEMENT BASED PLASTER.
- 6) STANDARD SPECIFICATION FOR STEEL DRILL SCREWS FOR THE APPLICATION OF GYPSUM BOARD OR MA
- 7) STANDARD SPECIFICATIONS FOR LOAD BEARING (TRANSVERSE AND AXIAL) STEEL STUDS, RUNNERS (TR
- 8) STANDARD SPECIFICATION FOR THE INSTALLATION OF LOAD BEARING (TRANSVERSE AND AXIAL) STEEL

### SPECIFICATIONS:

- 9) AMERICAN IRON AND STEEL INSTITUTE (AISI) COLD-FORMED STEEL DESIGN MANUAL, LATEST EDITION.
- 10) AMERICAN WELDING SOCIETY (AWS): STRUCTURAL WELDING CODE (D1.1 SPECIFICATION FOR WELDING
- 11) MILITARY SPECIFICATION (MILSPEC.) MIL-P-21035, PAINT, HIGH ZINC DUST CONTENT, GALVANIZING R
- 12) FEDERAL SPECIFICATIONS (FED. SPEC.) FF-P-395, PIN, DRIVE, GUIDED AND PIN DRIVE, POWER ACTU
- EXPANSION; AND NAIL, DRIVE SCREW (DEVICES, ANCHORING, MASONRY).

### MATERIALS:

- 13) ALL STUDS AND ACCESSORIES SHALL BE OF THE TYPE, SIZE, STEEL THICKNESS AND SPACING SHOWN
- SPECIFICATION C-955.
- 14) ALL GALVANIZED STUDS AND ACCESSORIES, (.0566" thick) 18GA. OR HEAVIER, SHALL BE FORMED FR
- THE AISI "SPECIFICATION FOR THE DESIGN OF COLD-FORMED STEEL STRUCTURAL MEMBERS", LATEST EDIT
- 15) ALL GALVANIZED STUDS AND ACCESSORIES, (.0451" thick) 18GA, 20 OR LESS, SHALL BE FORMED
- AS SET FORTH IN AISI "SPECIFICATION FOR THE DESIGN OF COLD-FORMED STEEL STRUCTURAL MEMBERS"
- 16) ALL GALVANIZED STUDS AND ACCESSORIES, 20GA, SHALL BE FORMED FROM STEEL THAT CONFORMS
- THE DESIGN OF COLD-FORMED STEEL STRUCTURAL MEMBERS, LATEST EDITION (1989 ADDENDUM).
- 17) ALL GALVANIZED STUDS AND ACCESSORIES SHALL HAVE A MINIMUM G-60 COATING.
- 18) PHYSICAL PROPERTIES AND ALLOWABLE LOAD CAPABILITIES OF MEMBERS SHALL BE DEVELOPED IN AC
- MEMBERS, LATEST EDITION (1989 ADDENDUM).
- 19) IN ACCORDANCE WITH AISI RIGID COLLATERAL FACING MATERIAL ATTACHED TO NON BEARING WALLS MA
- 20) PERFORATIONS WILL BE ALLOWED IN WEB OF STUDS ONLY, AT A MINIMUM EDGE DISTANCE OF 2'-0"
- ADDENDUM).

### EXECUTION:

- 21) PRODUCTS SHALL BE PROTECTED FROM CONDITIONS THAT MAY CAUSE ANY PHYSICAL DAMAGE.
- 22) MATERIALS SHALL BE STORED ON A FLAT PLANE.
- 23) IT SHALL BE THE RESPONSIBILITY OF THE PROJECT ARCHITECT OR ENGINEER OR THEIR APPOINTED PE
- SHALL BE REMOVED FROM THE JOB SITE IMMEDIATELY.

### INSTALLATION: GENERAL

- 24) METHODS OF CONSTRUCTION MAY BE EITHER PIECE (STICK-BUILT), OR BY FABRICATION INTO PANEL
- 25) CONNECTIONS SHALL BE ACCOMPLISHED WITH SELF-DRILLING SCREWS OR WELDING SO THAT THE
- 26) TRANSVERSELY LOADED STUDS NEED NOT SIT SQUARELY IN TRACKS BUT MUST BE ATTACHED TO THEM
- 27) AXIALLY LOADED STUDS SHALL BE INSTALLED, SEATED SQUARELY (WITHIN 1/16") AGAINST THE WEB FOR
- 28) CUTTING OF STEEL FRAMING MEMBERS MAY BE ACCOMPLISHED WITH A SAW OR SHEAR. TORCH CUTTING
- UNDER SUPERVISION OF THE PROJECT ENGINEER.
- 29) UTILIZE TEMPORARY BRACING AS REQUIRED AND KEEP IN PLACE UNTIL WORK IS PERMANENTLY STABIL
- 30) BRIDGING SHALL BE OF SIZE AND TYPE SHOWN ON THE ATTACHED SKETCHES.
- 31) DIAPHRAGM RATED SHEATHING MATERIALS MAY BE SUBSTITUTED FOR BRIDGING AT NON BEARING WALLS
- 32) INSTALL HEADERS IN ALL OPENINGS IN AXIALLY LOADED WALLS THAT ARE LARGER THAN THE STUD SPA
- 33) INSULATION EQUAL TO THE JOB REQUIREMENTS SHALL BE INSTALLED INTO ALL JAMBS, HEADERS, AND
- 34) PROVIDE JACK STUDS TO SUPPORT EACH END OF HEADERS. THESE STUDS SHALL BE CONNECTED TO
- 35) IF BY DESIGN, A HEADER IS LOW IN THE WALL, THE LESS THAN FULL-HEIGHT STUDS (CRIPPLES) THAT
- 36) WALL TRACK SHALL NOT BE USED TO SUPPORT ANY LOAD UNLESS SPECIFICALLY DESIGNED FOR THAT
- 37) ALL AXIALLY LOADED MEMBERS SHALL BE ALIGNED, VERTICALLY ALONG THE WEB AND FLANGES, TO ALLO
- FLOOR/WALL INTERSECTIONS OR ALTERNATE PROVISIONS FOR THE LOAD TRANSFER MAY BE MADE.
- 38) HOLES THAT ARE FIELD CUT INTO STEEL FRAMING MEMBERS SHALL BE WITHIN LIMITATIONS OF THE PRO
- ACCORDANCE WITH THE MANUFACTURER'S RECOMMENDATIONS AND APPROVED BY PROJECT ARCHITECT OR EN
- 39) TOUCH UP ALL STEEL BARED BY WELDING USING ZINC RICH PAINT.
- 40) STUDS SHALL BE SPACED TO SUIT THE DESIGN REQUIREMENTS AND LIMITATIONS OF COLLATERAL FACING
- 41) GYPSUM BOARD SHALL BE ATTACHED TO STEEL STUDS IN ACCORDANCE WITH ASTM SPECIFICATIONS C-8
- THAN 8" ON CENTER AT THE EDGES AND ENDS, AND NOT MORE THAN 12" ON CENTER, IN THE FIELD OF T
- 42) METAL PLASTER BASES SHALL BE ATTACHED IN ACCORDANCE WITH ASTM SPECIFICATION C-841, EXCEP
- 43) CARE SHOULD BE TAKEN TO ALLOW FOR ADDITIONAL STUDS AT INTERSECTIONS, CORNERS, DOORS, WIND
- 44) PROVISIONS FOR STRUCTURE MOVEMENT (EXPANSION) SHALL BE ALLOWED WHERE INDICATED AND NECES
- 45) SPlicing OF AXIALLY LOADED MEMBERS SHALL NOT BE PERMITTED.
- 46) WIRE TYING OF MEMBERS IS NOT PERMITTED.

### INSTALLATION: PANELIZED CONSTRUCTION:

- 47) PANELS SHALL BE DESIGNED TO RESIST CONSTRUCTION AND HANDLING LOADS AS WELL AS LOADS REDU
- 48) HANDLING AND LIFTING OF PREFABRICATED PANELS SHALL NOT CAUSE PERMANENT DISTORTION IN ANY
- 49) MAKE ALL STUD TO TRACK CONNECTIONS PRIOR TO HOISTING OF PANEL.
- 50) WHERE SPlicing OF TRACK IS NECESSARY BETWEEN STUD SPACING, A PIECE OF STUD SHALL BE PLAC
- 51) COMPLETE BEARING SHALL BE MAINTAINED UNDER TRACKS TO PROVIDE FOR LOAD TRANSFER IN AXIALLY
- 52) ATTACHMENT OF THE PANEL TO THE STRUCTURE SHALL BE AS SHOWN ON THE DRAWINGS.
- 53) ALIGN ALL PANEL TO PROVIDE CONTINUITY OF ANY WALL/FLOOR SURFACE.
- 54) INSTALLATION: NON-PANELIZED (STICK-BUILT) CONSTRUCTION:
- 55) ALIGN TRACK ACCURATELY AT SUPPORTING STRUCTURE AND FASTEN TO STRUCTURE AS SHOWN ON THE
- 56) TRACK INTERSECTIONS SHALL BUTT EVENLY.
- 57) STUDS SHALL BE PLUMBED, ALIGNED, AND SECURELY ATTACHED TO FLANGES OR WEBS OF UPPER AND
- 58) WHERE SPlicing OF TRACK IS NECESSARY BETWEEN STUD SPACING, A PIECE OF STUD SHALL BE PLAC
- 59) COMPLETE BEARINGS SHALL BE MAINTAINED UNDER TRACKS TO PROVIDE FOR LOAD TRANSFER IN AXIALLY
- RESPONSIBILITY TO INSURE THAT BEARING CRITERIA ARE "MET." ANY DISCREPANCY SHALL BE BROUGHT TO T

### FASTENINGS AND ATTACHMENTS:

- 60) ANCHORAGE OF THE TRACKS TO THE STRUCTURE SHALL BE WITH METHODS DESIGNED FOR THAT SPECIFIC
- 61) WELDS SHALL CONFORM TO THE REQUIREMENTS OF AWS D1.1, AWS D1.3, AND AISI MANUAL SECTION 4.2
- BY, AND WITHIN THE DESIGN CALCULATIONS. ALL WELDS SHALL BE TOUCHED UP USING ZINC RICH PAINT.
- 62) STEEL DRILL SCREWS SHALL BE OF THE MINIMUM DIAMETER INDICATED BY THE DESIGN OF THAT PARTICU
- THREADS.
- 63) SCREWS SHALL HAVE A PROTECTIVE COATING AT LEAST EQUIVALENT TO CADMIUM PLATING (ASTM A-165 T

### TO FRANCES: