

PART 1 - GENERAL

- .1 The requirements of Residential Standards Canada, NBC95 & MBC98 Amendments shall apply to this specification section. If more stringent specifications are indicated on drawings, they shall supersede the Residential Standards requirements.
- .2 Notes indicated on architectural and structural drawings are to be read in conjunction with this specification section.
- .3 Wood design in accordance with NBC – 95, PART 4, CSA 086.1-94 & TPIC-96. Nailing to NBC 95 Table 9.23.3.4. & 9.23.3.5.

PART 2 - MATERIALS

- 2.1 Lumber shall be the following grades unless noted otherwise: (Items listed below form a complete general list. Some items may not be applicable to this project - Refer to drawings)

BUILT-UP WOOD BEAM - No. 2 SPF or LVL lumber
JOISTS AND HEADERS - No. 2 SPF or LVL lumber
BRIDGING -2" x 2" (minimum) cross bridging (horizontal 1" x 4" shall not be considered an alternate)
SILL GASKET - ¼" Thick by wall plate width closed cell foam
SILL PLATES (in contact with concrete) - No.2 construction grade spruce PWF treated
WALL PLATES - No. 2 construction grade Spruce
WALL STUDS - No. 1 Kiln dried construction grade Spruce
EXTERIOR WALL SHEATHING - 3/8" standard sheathing grade Spruce plywood, or 7/16" aspenite
FLOOR SHEATHING - 5/8" T & G Standard grade Spruce plywood
SUBFLOOR ADHESIVE - B.F. GOODRICH PL400
FLOOR UNDERLAY - 5/16" (minimum) select grade Fir plywood
UNDERLAY ADHESIVE - White glue
ROOF SHEATHING - 1/2" standard sheathing grade Spruce plywood
FASCIA - No. 2 Spruce
SOFFIT - 3/8" GIS Fir plywood
PLYWOOD TRIM BOARDS - 3/4" GIS Crezon plywood
INTERIOR STAIRS - No. 1 Douglas Fir or 2 layers of 3/4" Fir Ply with No. 1 Douglas Fir exposed stringers
BASEMENT STAIRS - No. 1 Douglas Fir
EXTERIOR WOOD STAIRS - No. 2 Spruce PWF treated, stringers and treads
ROOF CURBS AND MECHANICAL ROOF MOUNTED EQUIPMENT SLEEPERS – No. 2 Spruce treated to PWF standards
PARKING RAIL FENCE AND POSTS - No. 2 Spruce treated to PWF standards

- 2.2 Engineered wood products, beams, columns and I-joists shall be designed by a Structural Engineer licensed to practice in Manitoba, and detailed shop and layout drawings shall be provided to TD Engineering Inc. for review prior to manufacture. Provide complete system design and supply including, hangers, blocking, fasteners and bridging etc. Wood I-joist are to be designed to accommodate applied loading from Rooftop mounted equipment and drift snow loading and deflection criteria.
- 2.3 Glulam shall be manufactured and supplied by a plant approved CSA under CSA 0177. Glulam columns to be minimum Spruce- Pine 12C-E. Glulam beams to be a minimum Spruce – Pine 20f-E Westlam. All connections (hangers, shoes etc.) shall be designed and supplied by Glulam supplier. Provide fully detailed shop drawings for review prior to manufacture.

PART 3 - APPLICATION

- 3.1 FLOOR AND ROOF FRAMING

- .1 All joists, rafters and beams shall be set with crown up.
- .2 Joists shall be set into forms in such a way as to provide positive embedment in concrete Work and care shall be taken so that upon completion of concrete Work, joist tops shall protrude a minimum of 1" above the level of the concrete to allow for wood shrinkage.
- .3 Double all joists and rafters to form required trimmer joists and provide double header joists at the following locations, unless otherwise noted: piping, stairs, dormers, shafts for soil and waste vents, bulkheads, trapdoors, etc. Any header joists over 2m (6 ft.) in length shall be tripled. Trimmer joists supporting triple header joists shall also be tripled.
- .4 All joists terminated at header joists and trimmer joists around openings must be supported by metal joist hangers.
- .5 Joists resting on wood sills or plates shall be toenailed to the bearing with a minimum 3 1/2" nails per joist.
- .6 Cutting joists or beams for piping or any other reason shall be done only upon Contract Administrator's approval and only if suitable alternate means is provided to carry the load for which the joists were intended.

3.2 BRIDGING

- .1 Provide bridging in all spans of 2.5 m (8 ft.) or more.
- .2 Bridging shall be spaced not more than 2 m (7 ft.) apart.
- .3 Cross bridging shall be nailed with two 60 mm (2 1/4") nails each end.

3.3 SHEATHING

- .1 Apply in full sheets and nail as recommended by the Manufacturer.
- .2 Roof sheathing shall be nailed as recommended by the Manufacturer. Set all panels with joints staggered and leave a 1/8" space between panels for expansion.

3.4 SUBFLOORING

- .1 Subfloor shall be nailed and glued to joists. Alternately, the subfloor may be screwed to joists at 200 mm o.c. with 45 mm (1 3/4") drywall screws.

3.5 UNDERLAY

- .1 Underlay is required under all resilient type flooring in wood frame structures.
- .2 Underlay shall be glued, as per manufacturer's instructions, to subfloor.
- .3 Plywood underlay shall be nailed with power driven or ring nails of adequate length are allowed for fastening.

3.6 FURRING

- .1 All furring shall be 38 mm (1 1/2") material (minimum) spaced 400 mm (16") o.c.
- .2 Furring attached to wood framing shall be nailed at every bearing.
- .3 Furring shall be set plumb, square and true to dimension.

- .4 Ceiling furring shall be securely attached to beams or joists and well braced to form a rigid ceiling.

3.7 BACKING AND BLOCKING

- .1 Provide adequate backing for all edges of exterior sheathing and for all exterior "accent" or trim boards.
- .2 For the following items, install adequate blocking (in accordance with the instructions supplied by the Manufacturer of each item) - exact heights to be determined on Site.
- .3 Provide adequate solid blocking, for cant strips, flashings, expansion joints, fascias, copings, trim, vents and grilles, curbs, mechanical equipment curbs and sleepers, plumbing equipment, light fixtures, electrical boxes, etc.
- .4 Nail, screw or bolt blockings to securely fix in position.
- .5 Consult Contract Administrator for locations of items not specifically dimensioned.
- .6 In the case of recessed fixtures, blocking shall completely surround and support fixtures.

3.8 VAPOUR BARRIER INTEGRITY

- .1 Rough carpentry Contractor shall install 6 mil poly strips at the top of all interior wall plates. Width of poly striping is to be wide enough to ensure a minimum 12" overlap to the wall vapour barrier. All rips and tears shall be repaired prior to final acceptance of rough carpentry Work.

3.9 WOOD TRUSSES

- .1 Design and fabrication criteria of wood trusses shall meet Code requirements and TPIC - 96. Refer to structural drawings for additional specification notes.
- .2 The lumber used in all wood trusses shall meet published stress ratings for species and grades as setout in official grading rules of appropriate lumber association; except that wherever truss engineering design calls for lumber which exceeds minimums set forth therein, the truss engineering designs shall be applicable.
- .3 The moisture content of lumber used in wood trusses shall be not more than 19% nor less than 7% at time of fabrication.
- .4 The lumber used in all wood trusses shall meet species and fully recognized nominal sizes shown on truss engineering designs. Members shall be cut from lumber which bears proper grade mark stamp of a recognized grading association or licensed lumber inspection agency.
- .5 Supply prefabricated truss shop drawings stamped by a Manitoba licensed engineer prior to fabrication. Prefabricated wood trusses to be manufactured by a member of the Western Wood Truss Association (MB), who is enrolled in a Quality Control Program, administered by an independent third party.

3.10 FASCIA & EXTERIOR TRIM BOARDS

- .1 Fascia boards shall be scribed to fit with 45 degree bevel cut butt joints fastened securely to backing, ready to receive pre-finished metal cladding by siding trade section 07465. Co-ordinate with the siding Contractor as to appropriate sizing and assembly to ensure clean accurate fit.

3.11 WINDOW INSTALLATION

- .1 Set window units in prepared opening plumb, square and level, free from warp, twist or superimposed loads.
- .2 Secure window units into rough openings according to manufacturer's instructions, in a manner not restricting normal movement of windows.
- .3 Infill space between rough framed opening and window unit frame with "low expansive type" urethane foam insulation, also lap and seal wall vapour barrier into foam insulation.

3.11 WOOD PARKING RAIL FENCE

- .1 Installation of wood fence may have to be delayed until City's road building Contractor establishes rough grade in this area.
- .2 Install wood post in gravel holes to the depth shown on the drawings.
- .3 Bolt fence together as per drawing details.

END OF SECTION

PART 1 - GENERAL

1.1 PROTECTION

- .1 All Work under this section shall be adequately protected against damage until the date of substantial performance.

PART 2 - MATERIALS

2.1 INTERIOR TRIM

- .1 Window Casings shall be minimum Clear paint grade Fir, size to be 12 mm x 63 mm .
- .2 Wood baseboards 19 mm x 89 Clear paint grade Fir" with a 12 mm radius to top exposed edge.

2.2 FASTENERS

- .1 Steel finishing nails for interior Work and galvanized finishing nails for exterior Work. Nails shall be long enough that at least half their length penetrates into the substrate material.

PART 3 - APPLICATION

- 3.1 All Work shall be installed straight, neat and securely nailed.
- 3.2 Work shall be scribed, mitred, and fitted in the best first class finishing manner with all nails set, or screws countersunk.
- 3.3 All moldings shall be united at external corners with 45 deg. mitres and at internal corners with butt joints.
- 3.4 Splices in wood trim pieces shall be cut at 45 deg., not butted square ends.
- 3.5 Exterior wood finish members shall be back primed before fixing.
- 3.6 Baseboards shall be attached with nails or trim screws.
- 3.7 Trim or other finish wood surfaces attached to masonry or concrete shall be installed using expansion bolts or toggle bolts. Fibre plugs or concrete nails are not acceptable.
- 3.8 As required, install all door and all misc. hardware. Lubricate, adjust and leave in perfect operating condition. Provide all hardware required for a first class job and complete with screws and fittings to match hardware finish.
- 3.9 Sand exposed faces smooth and even, suitable for finishes as specified.
- 3.10 The finish carpentry Contractor shall install all interior windows, doors, frames, c/w hardware as supplied by Hollow Metal Contractor. (Section 08100) Ensure exterior door frames are fully insulated before installing. Install hollow metal frames and glazed screen plumb and square with a maximum diagonal distortion of 1.5 mm. Ensure frames are securely and rigidly anchored to adjacent construction.
- 3.11 The Finish Carpentry Contractor shall install all washroom accessories as supplied by other trades. Exact location of accessories is to be confirmed with the Contract Administrator on Site.

END OF SECTION

PART 1 - GENERAL

1.1 PROTECTION

- .1 All cabinet Work, in storage or set in place, shall be adequately protected by Contractor until the date of substantial performance.
- .2 Protect cabinet Work from ground and atmospheric moisture, deformation, defacing, staining, etc.

1.2 SUBMITTALS

- .1 Submit shop drawings for all cabinetry indicating layouts, door and drywall locations and materials to be used in manufacture.
- .2 Cabinet colours, hardware pulls shall be selected at a later date by the Contract Administrator.

PART 2 - MATERIALS

2.1 Cabinets shall conform to the specifications listed below:

- .1 Doors, drawers and exposed gable ends shall be 12 mm (1/2") minimum particleboard with Melamine surfaces. All exposed edges shall be finished with solid PVC edging.
- .2 Cabinet frame shall be structurally rigid.
- .3 Upper cabinets shall have fastening strips concealed behind a pre-finished backing to match shelves.
- .4 Shelves shall be 12 mm (1/2") minimum melamine supported on adjustable clips. Shelf edging shall solid PVC permanently bonded to shelf edge.
- .5 All connections shall be glued. Make cabinets structurally rigid prior to installation. If staples are used they must be only to provide clamping action of glued joints and shall be concealed.
- .6 Inside surfaces of cabinets shall be pre-finished to match shelves. Insides of drawers shall be pre-finished to match shelves.
- .7 Provide doors with not less than 2 bumpers per door.
- .8 Doors shall be mounted on concealed hinges.
- .9 Door and drawer pulls shall be a brushed metal pull with standard 90 mm (3-1/2") centres and 22 mm (7/8") minimum finger space. Exact colour to later selection.
- .10 Drawers shall have pre-finished metal sliding roller hardware.
- .11 Concealed plywood to counter tops shall be either select sheathing grade Fir as per C.S.A. 0121-1973 or particleboard conforming to C.S.A. 0-188 for Type 1 material.
- .12 Adhesive formulated for use in plastic laminate fabrication to suit conditions and application without failure and as approved by the plastic laminate manufacturer.

PART 3 - EXECUTION

- 3.1 All cabinets shall be built to field measurements.

- 3.2 Scribing - make allowances and adjustments for cabinets to fit against walls.
- 3.3 Check and adjust doors, drawers, hardware, to provide smooth, easy operation.
- 3.4 All cabinets shall be securely fastened (screwed top and bottom) to all wall studs behind as well as to each adjacent module.
- 3.5 Counter tops shall be plastic laminate with matching exposed edges and 3-1/2" backsplash (minimum) where indicated on drawings.
- 3.6 Make allowances and adjustment for countertops to fit against walls.
- 3.7 Apply neat silicone caulked joint where backsplash fits against walls and at 45o angle cuts in the corner installation of countertops. Colour of caulking to be confirmed with the Contract Administrator.

END OF SECTION