Ground Floor

Engineered floor joists shall be installed in accordance with the supplier's layout and specifications forming part of the permit drawings.

CITY OF BRAMPTON BUILDING DIVISION REVIEWED MARK DERKSEN

18-33127100000RR-FLOOR 2"X8"@12"o/c LANDING 2 X J7-AG =BLK1= -J7-AG - @ 16"-■BLK1= UNEXCAVATED -A-PS /F3-A - 1 ply 7. BLK1 BLK1 BLK1 All work shall conform to the Ontario R1

This certification is to confirm that:

1. The loads used in the calculation of the attached approved components conform to the floor assembly shown on this layout. 2. The floor joists comply with the Nascor span table for the loads

and spacing shown on this layout.

The floor system must be assembled in accordance to the Nascor Specifier Guide. Multi-ply members must be attached together as per the included multiple member connection detail.

All other components and structural elements supporting the floor system such as beams, walls, columns and foundation walls and footings including anchorage of components and bracing for lateral stability are the responsibility of others.

OROFESSIONA, T.L. WISE 100083566 September 13, 2018

Building Cede Q. Reg. 332/12 as amended

1. OBC 2012 O.Reg 332/12 as amende

- 2. Nascor CCMC 13535-R
- 3. LVL CCMC -14056-R
- 4. CAN/CSA-086-09
- 5. CCMC -12787-R APA PR-L310(C)

LVL/LS	L (Flush)							DA II AD
Label	Description	Width	Depth	Qty	Plies	Pcs	Length	
F5	Forex 2.0E-3000Fb LVL	1.75	11.875			2	14-0-0	44
F15	Forex 2.0E-3000Fb LVL	1.75	11.875	1	2	2	12-0-0	Layout Na MILLWOO
F4	Forex 2.0E-3000Fb LVL	1.75	11.875			1	6-0-0	Design Me
F3	Forex 2.0E-3000Fb LVL	1.75	11.875			1	4-0-0	Descriptio
l Joist (Flush)							Created
Label	Description	Width	Depth	Qty	Plies	Pcs	Length	June 25, 20
F12	NJ	1.5	11.875	3	2	6	16-0-0	
F11	NJ	1.5	11.875	2	2	4	14-0-0	Builder
F10	NJ	1.5	11.875	2	2	4	4-0-0	GREENPA
F9	NJ	1.5	11.875	2	2	4	2-0-0	Sales Rep
J7	NJH	2.5	11.875			35	16-0-0	RM
J6	NJH	2.5	11.875	1		16	14-0-0	Designer
J5	NJH	2.5	11.875			2	12-0-0	RO
J4	NJH	2.5	11.875			1	10-0-0	
J3	NJH	2.5	11.875			1	8-0-0	Shipping
J2	NJH	2.5	11.875			3	6-0-0	Project
Rim Bo	ard							Builder's F
Label	Description	Width	Depth	Qty	Plies	Pcs	Length	Kott Lu
R1	Norbord Rimboard Plus 1.125 X	1.125	11.875			12	.12	14 Anderso

Hanger

Ground Floor

					beam/Girder	Member	
Label	Pcs	Description	Skew	Slope	fasteners	fasteners	1
НЗ	6	LT2-151188			4 10dx1 1/2	2 10dx1 1/2	
H4	11	LT251188			4 10dx1 1/2	2 10dx1 1/2	
H5	1	HUCQ1.81/9- SDS					

Blocking Qty Plies Pcs Length Design Method Label Description Width Depth BLK1 NJH 2.5 11.875 LinFt

NOTES:

. Framer to verify dimensions on the architectural drawings.

2. Double joist only require filler/backer ply when supporting another member using a face-mounted hanger.

3. Install 2x4 blocking @ 24"o/c under parallel non-load bearing walls.

Install single-ply flush window header along inside face of rimboard/rimjoist.

5. Refer to Nascor specifier guide for installation works.

5. Squash blocks recommended to be installed at end bearing on all first level joists which support loading from above exceeding two levels floor or roof . Load transfer blocks to be installed under all point loads.

3. It shall be the frame's responsibility that floor joists and beams are fastened as per the hanger manufacturer's standards.

Refer to Multiple Member Connection Detail to ply to ply nailing or

Rim parallel to joists: 1-1/8" rimboard with 2"x4" block (1/16" longer than rim depth @ 16"o/c). All other components and structural elements supporting the floor system such as beams, walls, columns, and foundation walls, and footings including anchorage of components and bracing for lateral stability are the responsibility of Others.

Hatch are represents ceramic tiled floor with an additional dead load

The framing shown on this layout may deviate from the architectural and structural drawings. Project Engineer to review and apporve the deviation prior to construction.

ARCHITECTURAL DRAWINGS:

JARDIN DESIGN GROUP INC. 64 Jardin Dr., Suite 3A Date: Rev. 1, 4/26/2018 Project No: 2645 Model: Millwood 2, Elevation 1

Legend

Point Load Support Load from Above Wall Opening Norbord Rimboard Plus 1.125 X 11.875 NJ 11.875 NJH 11.875

Forex 2.0E-3000Fb LVL 1.75 X 11.875

Layout Name MILLWOOD 2-ELEV 1 Design Method LSD Description Created June 25, 2018 Builder GREENPARK Sales Rep RM

Project **Builder's Project Kott Lumber Company**

14 Anderson Blvd Stouffville, Ontario Canada K2H7V1

905-642-4400

Job Path S:\CUSTOMERS\GREENPARK \MINNISALE HOMES\MODELS \MILLWOOD 2\FLOORS\ELEV 1 \MILLWOOD 2-ELEV 1.isl

Ground Floor Varies 29-0-0 Building Code NBCC 2010 / OBC

Floor Loads 40 Live 15 Dead Deflection Joist 480 LL Span L/ TL Span L/ 360 LL Cant 2L/ 480 360 TL Cant 2L/ Deflection Girder LL Span L/ 360 240 TL Span L/ 480 LL Cant 2L/ TL Cant 2L/ 240 Decking SPF Plywood Deck

Nailed & Glued

Thickness

Fastener

Vibration

Layout Name

June 25, 2018

GREENPARK

Kott Lumber Company

S:\CUSTOMERS\GREENPARK \MINNISALE HOMES\MODELS

MILLWOOD 2\FLOORS\ELEV 1

Building Code NBCC 2010 / OBC

LSD

2012

40

15

480

360

480

360

360

240

480

240

SPF Plywood

Nailed & Glued

Gypsum 1/2"

\MILLWOOD 2-ELEV 1.isl

Second Floor

Design Method

Deflection Joist LL Span L/

TL Span L/

LL Cant 2L/

TL Cant 2L/

LL Span L/

TL Span L/

LL Cant 2L/

TL Cant 2L/

Decking

Thickness

Fastener

Vibration

Ceiling:

Deck

Deflection Girder

Floor

Loads

Live

Dead

14 Anderson Blvd

Stouffville, Ontario Canada

K2H7V1 905-642-4400 Job Path

LSD

RM

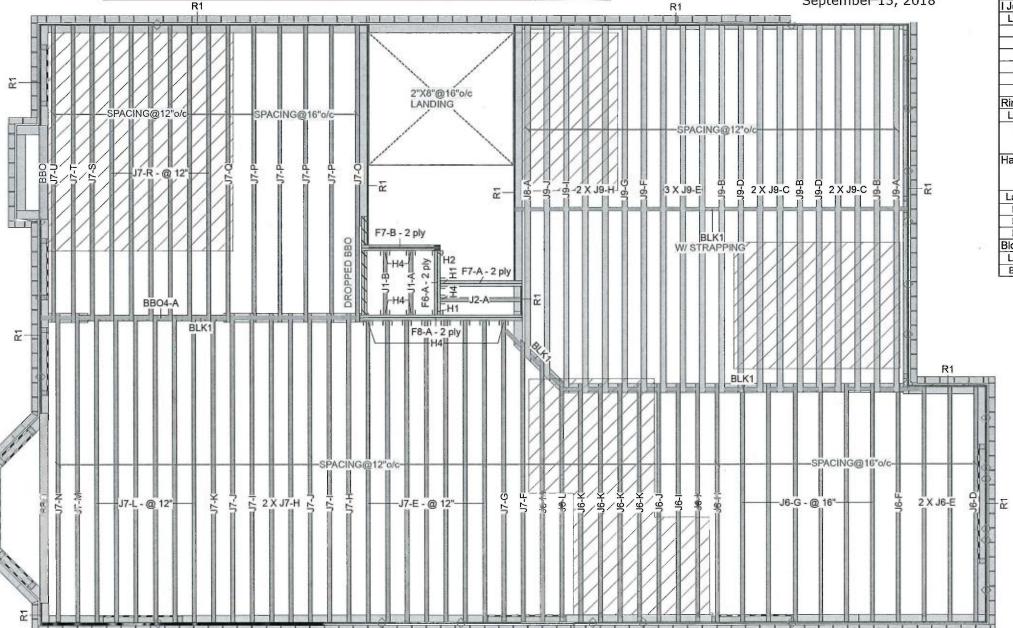
RO

MILLWOOD 2-ELEV 1

Second Floor This certification is to confirm that: 1. The loads used in the calculation of the attached approved components conform to the floor assembly shown on this layout. 2. The floor joists comply with the Nascor span table for the loads and spacing shown on this layout. The floor system must be assembled in accordance to the Nascor Specifier Guide. Multi-ply members must be attached together as per the included multiple member connection detail. All other components and structural elements supporting the floor system such as beams, walls, columns and foundation walls and footings including anchorage of components and bracing for lateral stability are the responsibility of others.

PROFESSIONAL FILE T.L. WISE 100083566 WCEOFON

September 13, 2018



Second Floor LVL/LSL (Flush) Width Depth Qty Plies Label Description Pcs Length 1.75 11.875 2 10-0-0 2.0E-3000Fb LVL 1.75 6-0-0 Forex 2.0E-3000Fb LVL 1.75 11.875 4-0-0 Design Method 2 Forex 2 2.0E-3000Fb LVL LVL/LSL (Dropped) Description Pcs Length Label Description Width Depth Qty Plies Created BBO4 Forex 1.75 9.5 2 2 8-0-0 2.0E-3000Fb LVL Joist (Flush) Builder Width Depth Qty Plies Label Description Pcs Length J9 NJ60U 3.5 11.875 19 20-0-0 Sales Rep J8 NJ60U 3.5 11.875 18-0-0 J7 NJH 2.5 11.875 40 16-0-0 2.5 11.875 14-0-0 J6 NJH 20 Designer 2.5 11.875 J2 NJH 1 6-0-0 J1 NJH 2.5 11.875 2 4-0-0 Shipping Rim Board Project Label Description Width Depth | Qty | Plies Pcs Length Builder's Project Norbord Rimboa 1.125 11.875 Plus 1.125 X 11.875

Hanger

					Beam/Girder	Supported Member
Label	Pcs	Description	Skew	Slope	fasteners	fasteners
H1	2	HGUS410			46 16d	16 16d
H2	1	HUC410 (Min)			14 16d	6 10d
H4	13	LT251188			4 10dx1 1/2	2 10dx1 1/2
lockin	g					

Label Description Width Depth Qty Plies Pcs Length BLK1 NJH 2.5 11.875 LinFt

NOTES:

- . Framer to verify dimensions on the architectural drawings.
- 2. Double joist only require filler/backer ply when supporting another member using a face-mounted hanger.
- Install 2x4 blocking @ 24*0/o under parallel non-load bearing walls.
 Install single-ply flush window header along inside face of

- Refer to Nascor specifier guide for installation works.
 Squash blocks recommended to be installed at end bearing on all first level joists which support loading from above exceeding two levels floor or roof
- . Load transfer blocks to be installed under all point loads.
- . It shall be the frame's responsibility that floor joists and beams are fastened as per the hanger manufacturer's standards.

Refer to Multiple Member Connection Detail to ply to ply nailing or bolting requirements.

Rim parallel to joists: 1-1/8" rimboard with 2"x4" block (1/16" longer than rim depth @ 16"o/c). All other components and structural elements supporting the floor system such as beams, walls, columns, and foundation walls, and footings including anchorage of components and pracing for lateral stability are the responsibility of Others.

Hatch are represents ceramic tiled floor with an additional dead load

The framing shown on this layout may deviate from the architectural and structural drawings. Project Engineer to review and apporve the deviatio prior to construction.

ARCHITECTURAL DRAWINGS:

JARDIN DESIGN GROUP INC. 64 Jardin Dr, Suite 3A Date: Rev. 1, 4/26/2018 Project No: 2645 Model: Millwood 2, Elevation 1

Legend

Point Load Support Load from Above

Wall Opening Norbord Rimboard Plus 1.125 X 11.875

NJ 11.875 NJ60U 11.875 NJH 11.875

Forex 2.0E-3000Fb LVL 1.75 X 9.5 (Dropped) Forex 2.0E-3000Fb LVL 1.75 X 11.875

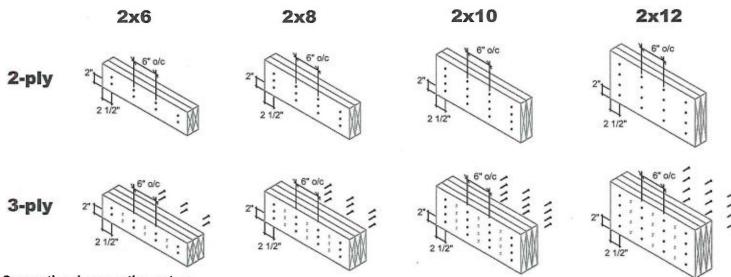
- 1. OBC 2012 O.Reg 332/12 as amended
- 2. Nascor CCMC 13535-R
- 3. LVL CCMC -14056-R
- 4. CAN/CSA-O86-09
- 5. CCMC -12787-R APA PR-L310(C)

Version 18.40.162 Powered by iStruct™

This layout is to be used as an installation guide only. It is meant to be used in conjunction with the architectural and structural drawings, not to replace them

MULTIPLE MEMBER CONNECTIONS

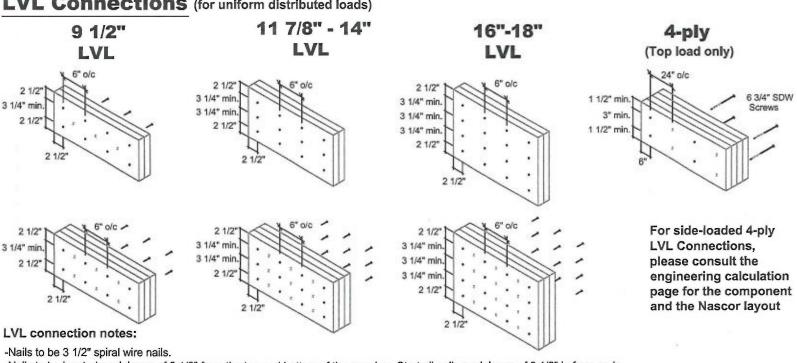
Conventional Connections (for uniform distributed loads)



Conventional connection notes:

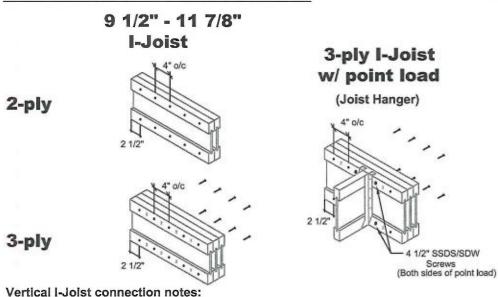
- -Nails to be 3" 10d spiral wire nails.
- -Nails to be located a minimum of 2" from the top and bottom of the member. Start all nails a minimum of 2 1/2" in from ends.
- -Number of rows and spacing as per details shown, unless noted otherwise.
- "X" represents nail driven from the opposite side.

LVL Connections (for uniform distributed loads)



- -Nails to be located a minimum of 2 1/2" from the top and bottom of the member. Start all nails a minimum of 2 1/2" in from ends.
- -Minimum 3 1/4" spacing between rows.
- -Number of rows and spacing as per details shown, unless noted otherwise.
- "X" represents nail or screw driven from the opposite side.

Vertical I-Joist Connections (for uniform distributed loads)



Vertical I-Joist connection notes:

- -Nails to be 3" spiral wire nails.
- -Nails to be located at centre of top and bottom flanges. Start all nails a minimum of 2 1/2" in from ends.
- -Number of rows and spacing as per details shown, unless noted otherwise.
- "X" represents nail driven from the opposite side.

3228 Moodie Drive Ottawa, ON K2H 7V1 Ph: 613-838-2775

Date: November 30, 2016 Scale: NTS

MULTI-PLY CONNECTION

DETAILS

Fx: 613-838-4751

TW0918-058

REVISION 2009-10-09

Please read all notes prior to installation of the component

DESIGN INFORMATION

This building component is certified as an individual component for the loads and conditions shown on the calculation and drawing page.

The responsibility of the undersigned engineer is <u>only</u> limited to the calculation of this building component for the loads and conditions shown on this drawing.

The responsibility of the undersigned is limited to the verification of the structural capacity of the NASCOR floor joists and LVL beams based on placement as shown on the layout. The loads applied are limited to the gravity effects of the specified loads. The structural integrity of the building and the effect of wind, uplift, seismic, lateral or other forces, calculation of adequate support and anchorage of components, as well as the dimensions and design loads used to calculate components are the responsibility of the overall building designer.

Floor joists and OSB rim board are designed to carry uniformly distributed loads only. Point loads should be transferred through the floor cavity with squash blocks. Structural elements such as walls, posts, connectors, and squash blocks are the responsibility of the overall building designer.

The undersigned engineer disclaims any responsibility for damages as a result of being furnished faulty or incorrect information, specifications and/or designs.

Installation of NASCOR joists is to be carried out in accordance with the current edition of the manufacturer's approved literature available at http://www.nascor.ca.

CODE

This building component is designed in accordance with the National Building Code of Canada, the Ontario Building Code, CCMC and Canadian Standards Association guidelines.

COMPONENT

- 1. The building component used in construction must be the same as indicated on the drawings.
- 2. The building component must be installed and assembled as per specification shown on the drawing and in accordance with the manufacturer's assembly and installation.
- 3. Members consisting of multiple plies must be connected as per the document "Multi-ply Connection Details".
- 4. Pass-thru squash block framing is required at all point loads over bearings.

HANDLING AND INSTALLATION

Do not drill any hole, cut or notch a certified building component without a written preauthorization.



MULTIPLE MEMBER CONNECTIONS

Conventional Connections (for uniform distributed loads)

2x6

2x8

2x12

2-ply







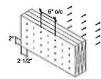


3-ply









Conventional connection notes:

-Nails to be 3" 10d spiral wire nails.
-Nails to be located a minimum of 2" from the top and bottom of the member. Start all nails a minimum of 2 1/2" in from ends.

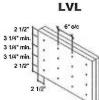
-Number of rows and spacing as per details shown, unless noted otherwise.
- "X" represents nall driven from the opposite side.

LVL Connections (for uniform distributed loads)

LVL



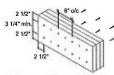
11 7/8" - 14" LVL

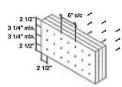


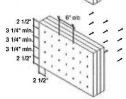
16"-18"

4-ply (Top load only)









For side-loaded 4-ply LVL Connections, please consult the engineering calculation page for the component and the Nascor layout

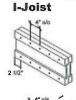
LVL connection notes:

-Nails to be 3 1/2" spiral wire nails.
-Nails to be located a minimum of 2 1/2" from the top and bottom of the member. Start all nails a minimum of 2 1/2" in from ends.

-Maintain 3 1/4* spacing between rows.
-Number of rows and spacing as per details shown, unless noted otherwise.
-"X" represents nail or screw driven from the opposite side.

Vertical I-Joist Connections (for uniform distributed loads)

9 1/2" - 11 7/8"



3-ply I-Joist w/ point load

(Joist Hanger)





3-ply

2-ply

Vertical I-Joist connection notes:

-Nails to be 3" spiral wire nails.

-Nalis to be o spiral who talks.

Alalis to be located at centre of top and bottom flanges. Start all nalls a minimum of 2 1/2" in from ends.

-Number of rows and spacing as per details shown, unless noted otherwise.

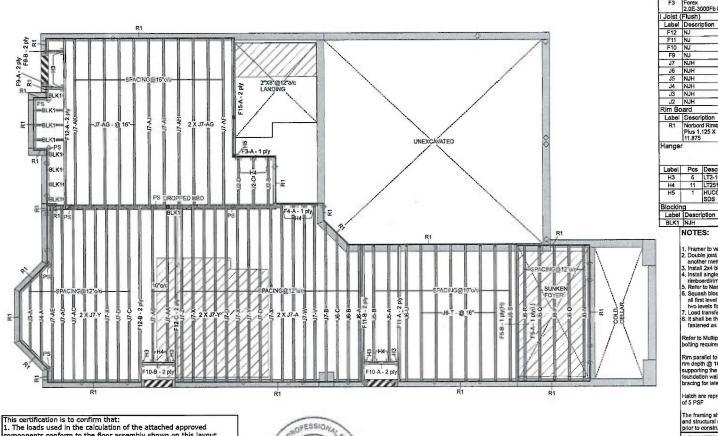
-"X" represents nail driven from the opposite side.

3228 Moodle Drive Ottawa, ON K2H 7V1 Ph: 613-838-2775

MULTI -PLY CONNECTION DETAILS

Ground Floor





Graund Floor LVL/LSL (Flush) Label Description Width Depth | Qty | Plies | Pcs | Longth F5 1.75 11.875 2 14-0-0 Forex 2.0E-3000Fb LVL Layout Name 12-0-0 F15 Forex 2.0E-3000Fb LVL MILLWOOD 2-ELEV 1 F4 Forex 2.0E-3000Fb LVL 1.75 11.875 6-0-0 Design Method LSD 1.75 11.875 Forex 2,0E-3000Fb LVL Description Joist (Flush) Created Width Depth Qty Plies Pcs Length Label Description June 25, 2018 F12 NJ 1.5 11.875 1.5 11.875 Builder 4 14-0-0 F11 N. GREENPARK F10 NJ 1.5 11.875 F9 NJ 4 2-0-0 Sales Rep 2.5 11.875 35 16-0-0 RM J7 NJH J6 NJH 2.5 11.875 16 14-0-0 Designer J5 NJH 2.5 11.875 2.5 11.875 2 12-0-0 RO J4 NJH J3 NJH J2 NJH 1 10-0-0 1 8-0-0 Shipping 2.5 11.875 3 6-0-0 Project 25 11.875 Rim Board **Builder's Project** Width Depth Qty Plies Pcs Length Label Description Kott Lumber Company 14 Anderson Blvd Plus 1,125 X Stouffville, Ontario 11.875 Canada Hanger K2H7V1 Ream/Girder Supported 905-642-4400
 Label
 Pcs
 Description
 Skew
 Slope

 H3
 6
 LT2-151188
 Incompany of the control of the co fasteners fasteners Job Path 4 10dx1 1/2 2 10dx1 1/2 S:\CUSTOMERS\GREENPARK \MINNISALE HOMES\MODELS \MILLWOOD 2\FLOORS\ELEV 1 H4 11 LT251188 H5 1 HUCQ1.81/9-SDS 4 10dx1 1/2 2 10dx1 1/2

NOTES:

- 1. Framer to verify dimensions on the architectural drawings. Framer to verry unmensions on ure a drainedural unavirigus.
 Double joist only require fifter/backer ply when supporting another member using a face-mounted hanger.
 Install 246 blooking @ 24°cu under paralle non-load bearing walls.
 Install 34 blooking @ 24°cu under paralle non-load bearing walls.
- Refer to Nescor specifier guide for installation works. Squash blocks recommended to be installed at end bearing on all first level joists which support loading from above exceeding. two levels floor or roof.
- Load transfer blocks to be installed under all point loads,
 It shall be the frame's responsibility that floor joists and beams are fastened as per the hanger manufacturer's standards.

Refer to Multiple Member Connection Detail to ply to ply nailing or

Rim parallel to joists: 1-1/8" rimboard with 2"x4" block (1/16" longer than min depth @ 16°o/c). All other components and structural elements supporting the floor system such as beams, walls, columns, and foundation walls, and footings including anchorage of components and bracing for lateral stability are the responsibility of Others

Hatch are represents ceramic tiled floor with an additional dead load of 5 PSF

The framing shown on this layout may deviate from the architectural and structural drawings. Project Engineer to review and apporve the deviation prior to construction.

ARCHITECTURAL DRAWINGS:

JARDIN DESIGN GROUP INC. 64 Jardin Dr. Suite 3A Date: Rev. 1, 4/26/2018 Project No: 2645 Model: Millwood 2, Elevation 1

Legend

- 1. OBC 2012 O.Reg 332/12 as amenda
- 2. Nascor CCMC 13535-R
- 3. LVL CCMC -14056-R
- 4. CAN/CSA-086-09
- 5. CCMC -12787-R APA PR-L310(C)

1111111

Point Load Support Load from Above Wall Opening

Norbord Rimboard Plus 1,125 X 11.875 NJ 11 875 NJH 11.875 Forex 2.0E-3000Fb LVL 1.75 X 11.875

Deck

Thickness

Fastener

Vibration

Version 18.40.162 Powered by iStruct's

and spacing shown on this layout.

the included multiple member connection detail.

stability are the responsibility of others.

components conform to the floor assembly shown on this layout.

2. The floor joists comply with the Nascor span table for the loads

The floor system must be assembled in accordance to the Nascor

All other components and structural elements supporting the floor

footings including anchorage of components and bracing for lateral

system such as beams, walls, columns and foundation walls and

Specifier Guide. Multi-ply members must be attached together as per

This layout is to be used as an installation guide only. It is meant to be used in conjunction with the architectural and structural drawings, not to replace them

T.L. WISE

100083566

VOE OF OF

September 13, 2018

 Width
 Depth
 Cty
 Piles
 Pcs
 Length
 Design Method

 2.5
 11.875
 LinFt
 Varies
 29-0-0
 Building Code
 Building Code NBCC 2010 / OBC 2012 Floor Loads 40 I Iva Dead 15 Deflection Joist 480 LL Span L/ 36D TL Span L/ 480 LL Cant 2L/ 360 Ti Cant 21/ Deflection Girder 360 LL Span L/ 240 TL Span L/ 480 LL Cant 2L/ TL Cant 2L/ 240 Decking

MILLWOOD 2-ELEV 1.is/ Ground Floor

LSD

SPF Plywood

3/4 Nailed & Glued



GREENPARK

Project: Address: Date:

9/7/2018

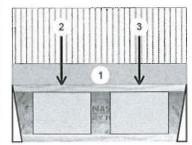
RO Designer:

Job Name: MILLWOOD 2-ELEV 1

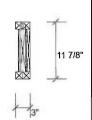
Project #:

2-Ply - PASSED 11.875" NJ

Level: Ground Floor



1 Hanger (LT2-151188) 2 Hanger (LT2-151188)



Page 1 of 1

•	v
Member Inform	nation
Туре:	Girder
Plies:	2
Moisture Condition:	Dry
Deflection LL:	360
Deflection TL:	240

Floor (Residential) Application: Design Method: LSD **Building Code:** NBCC 2010 / OBC 2012 Load Sharing: No Not Checked

Brg Live 282 1 287 2

Unfactored Reactions UNPATTERNED Ib (Uplift) Wind Dead Snow 106 0 0 0 0 108

240 Deck: Normal Vibration: Not Checked 40 PSF 15 PSF

Bearings and Factored Reactions

Bearing	Length	Cap.	React D/L lb	Total	Ld. Case	Ld. Comb.
1 - Hanger	2.000"	20%	132 / 423	555	L	1.25D+1.5L
2 - Hanger	2.000"	21%	135 / 431	566	L	1.25D+1.5L

Wind

Analysis Results

Importance:

Floor Live:

Dead:

General Load

Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
Moment	401 ft-lb	1'4 1/2"	9020 ft-lb	0.044 (4%)	1.25D+1.5L	L
Unbraced	401 ft-lb	1'4 1/2"	5749 ft-lb	0.070 (7%)	1.25D+1.5L	L
Shear	558 lb	2'10 3/4"	3400 lb	0.164 (16%)	1.25D+1.5L	L
Perm Defl in.	0.001 (L/38142)	1'5 9/16"	0.093 (L/360)	0.010 (1%)	D	Uniform
LL Defl inch	0.002 (L/14284)	1'5 1/2"	0.093 (L/360)	0.030 (3%)	L	L
TL Defl inch	0.003 (L/10392)	1'5 9/16"	0.140 (L/240)	0.020 (2%)	D+L	L

Design Notes

- 1 Fill all hanger nailing holes.
- 2 Girders are designed to be supported on the bottom edge only.
- 3 Multiple plies must be fastened together as per manufacturer's details.
- 4 To
- 5 To
- 6 E

top loads	must be supported equi	ally by all piles.					
Top flange	e braced at bearings.						
Bottom fla	ange braced at bearings.						
	Load Type	Location	Trib Width	Side	Dead	Live	Snow
	Tie-In	0-0-0 to 3-0-0	(Span)1-9-8	Тор	15 PSF	40 PSF	0 PSF
	Point	0-10-4		Far Face	87 lb	233 lb	0 lb
	Point	2-2-4		Far Face	86 lb	229 lb	0 lb



0 PSF Pass-Thru Framing Squash Block is requnded aball point loads over bearings

Comments

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Notes

ID

2

3

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the daslign criteria and loadings shown. If is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads.

Lumber

Dry service conditions, unless noted otherwise
 Uoist not to be treated with fire retardant or corr

Handling & Installation

- IAITUITING & INSTAILATION

 I Joist flanges must not be cut or drilled

 Refer to latest copy of the Joist product information details for framing details, stiffener tables, web hole chart. bridging details, multi-ply fastening details and handling/erection details

 Damaged Joists must not be used

 Design assumes top flange to be laterally restrained by attached shealthing or as specified in engineering notes.

- Provide lateral support at bearing points to avoid lateral displacement and rotation
 Web stiffeners for point load as shown Minimum point load bearing length>= 3.5 inches
 For flat roofs pr

This design is

Manufacturer Info

Nascor by Kott

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.



isDesign™

Client: GREENPARK

Project: Address:

9/7/2018 Date:

Designer: RO

Job Name: MILLWOOD 2-ELEV 1

Project #

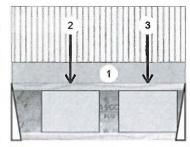
Brg

1

2

11.875" 2-Ply - PASSED F10-B NJ

Level: Ground Floor



1 Hanger (LT2-151188) 2 Hanger (LT2-151188) 3'



Wind

0

Page 1 of 1

Member Inform	ıation		
Туре:	Girder	Application:	Floor (Residential)
Plies:	2	Design Method:	LSD
Moisture Condition:	Dry	Building Code:	NBCC 2010 / OBC 2012
Deflection LL:	360	Load Sharing:	No
Deflection TL:	240	Deck:	Not Checked
Importance:	Normal	Vibration:	Not Checked
General Load			
Floor Live:	40 PSF		
Dead:	15 PSF		

Live

343

404

Unfactored Reactions UNPATTERNED Ib (Uplift)

Dead

129

152

Snow

0

0

Bearings and Factored Reactions								
Bearing	Length	Cap.	React D/L lb	Total	Ld. Case	Ld. Comb.		
1 - Hanger	2.000"	25%	161 / 514	675	L	1.25D+1.5L		
2 - Hanger	2.000"	29%	189 / 606	795	L	1.25D+1.5L		

Analysis Results

	Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
	Moment	583 ft-lb	1' 1/4"	9020 ft-lb	0.065 (6%)	1.25D+1.5L	L
	Unbraced	583 ft-lb	1' 1/4"	5749 ft-lb	0.101 (10%)	1.25D+1.5L	L
	Shear	788 lb	2'10 3/4"	3400 lb	0.232 (23%)	1.25D+1.5L	L
i	Perm Defl in.	0.001 (L/27610)	1'1 5/16"	0.093 (L/360)	0.010 (1%)	D	Uniform
	LL Defl inch	0.003 (L/10370)	1'1 5/16"	0.093 (L/360)	0.030 (3%)	L	L
	TL Defl inch	0.004 (L/7538)	1'1 5/16"	0.140 (L/240)	0.030 (3%)	D+L	L

Design Notes

- 1 Fill all hanger nailing holes.
- 2 Girders are designed to be supported on the bottom edge only.
- 3 Multiple plies must be fastened together as per manufacturer's details.
- 4 Top loads must be supported equally by all plies.
- 5 Top flange braced at bearings.
- 6 Bottom flange braced at bearings.

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September 13 2018

September 13, 2018

ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Tie-In	0-0-0 to 3-0-0	(Span)1-9-8	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
2	Point	1-0-4		Far Face	130 lb	346 lb	0 lb	0 lb	J7
3	Point	2-4-4		Far Face	110 lb	293 lb	0 lb		ուփFraming Squash Block is f at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to nesure the component suitability of the inlended application, and to verify the dimensions and loads.

Dry service conditions, unless noted otherwise
 Uotst not to be treated with fire retardant or corr

chemicals

Handling & Installation

- I. Joist flanges must not be cut or drilled
 Refer to latest copy of the IJoist product information details for framing details, stiffener tables, web hote chart, bridging details, multi-ply fastening details and handling/erection details
 Damaged IJoists must not be used
 Cesign assumes top flange to be laterally restrained by attached sheathing or as specified in engineering notes.
- Provide lateral support at bearing points to avoid lateral displacement and rotation
 Web stiffeners for point load as shown Minimum point load bearing length>= 3.5 inches
 For flat roofs pronding
 READ ALL NOTES ON T

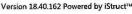
This design is

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT **CONTAINS SPECIFICATIONS AND CRITERIA USED** IN THE DESIGN OF THIS COMPONENT.

Manufacturer Info

Nascor by Kott









GREENPARK Client:

Project:

Address:

9/7/2018 Date: Designer:

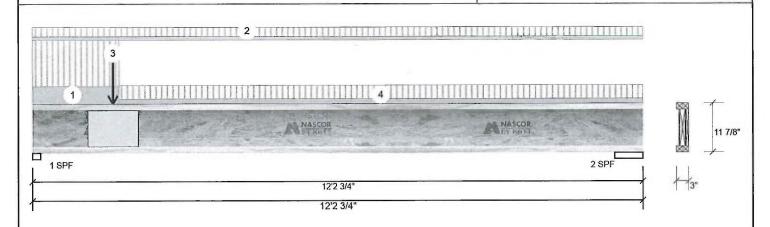
RO

Job Name: MILLWOOD 2-ELEV 1

Project #:

2-Ply - PASSED 11.875" NJ

Level: Ground Floor



Member Inform	nation			Unfactored Reactions UNPATTERNED Ib (Uplift)							
Type:	Girder	Application:	Floor (Residential)	Brg	Live		Dead	Snov	N	Wind	
Plies:	2	Design Method:	LSD	1	512		192		0	0	
Moisture Condition:	Dry	Building Code:	NBCC 2010 / OBC 2012	2	243		91		0	0	
Deflection LL:	360	Load Sharing:	No								
Deflection TL:	240	Deck:	Not Checked								
Importance:	Normal	Vibration:	Not Checked								
General Load		1									
Floor Live:	40 PSF			Bearings	and Fac	tored F	Reactions				
Dead:	15 PSF			Bearing	Length	Сар.	React D/L lb	Total	Ld. Case	Ld. Comb.	
				1-SPF	1.875"	38%	240 / 767	1008	L	1.25D+1.5L	
				2-SPF	6.875"	14%	114 / 365	479	L	1.25D+1.5L	

Analysis Results

	Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
	Moment	1602 ft-lb	4'6 5/8"	9020 ft-lb	0.178 (18%)	1.25D+1.5L	L
	Unbraced	1602 ft-lb	4'6 5/8"	1617 ft-lb	0.991 (99%)	1.25D+1.5L	L
	Shear	993 lb	1 1/8"	3400 lb	0.292 (29%)	1.25D+1.5L	L
	Perm Defl in.	0.018 (L/7877)	5'6 5/16"	0.388 (L/360)	0.050 (5%)	D	Uniform
	LL Defl inch	0.047 (L/2957)	5'6 5/16"	0.388 (L/360)	0.120 (12%)	L	L
	TL Defl inch	0.065 (L/2150)	5'6 5/16"	0.581 (L/240)	0.110 (11%)	D+L	L
1							

Design Notes

- 1 Girders are designed to be supported on the bottom edge only.
- 2 Multiple plies must be fastened together as per manufacturer's details.
- 3 Top loads must be supported equally by all plies.
- 4 Top flange must be laterally braced at a maximum of 5'7" o.c.

4'6 5/8"	9020 ft-lb	0.178 (18%)	1.25D+1.5L	L
4'6 5/8"	1617 ft-lb	0.991 (99%)	1.25D+1.5L	L
1 1/8"	3400 lb	0.292 (29%)	1.25D+1.5L	L
5'6 5/16"	0.388 (L/360)	0.050 (5%)	D	Uniform
5'6 5/16"	0.388 (L/360)	0.120 (12%)	L	L
5'6 5/16"	0.581 (L/240)	0.110 (11%)	D+L	L
	4'6 5/8" 1 1/8" 5'6 5/16" 5'6 5/16"	5'6 5/16" 0.388 (L/360)	4'6 5/8" 1617 ft-lb 0.991 (99%) 1 1/8" 3400 lb 0.292 (29%) 5'6 5/16" 0.388 (L/360) 0.050 (5%) 5'6 5/16" 0.388 (L/360) 0.120 (12%)	4'6 5/8" 1617 ft-lb 0.991 (99%) 1.25D+1.5L



September 13, 2018

Type Location	- 0 100 101						
1 Type Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
n 0-0-0 to 1-8-14	(Span)3-3-0	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
0-0-0 to 12-2-12	(Span)0-7-12	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
1-7-6		Far Face	108 lb	287 lb	0 lb	0 lb	F10
1-8-14 to 12-2-12	(Span)0-11-4	Тор	15 PSF	40 PSF	0 PSF	0 PSF	ru Framing Squash Block is
t	1-7-6	1-7-6	1-7-6 Far Face	1-7-6 Far Face 108 lb	1-7-6 Far Face 108 lb 287 lb	1-7-6 Far Face 108 lb 287 lb 0 lb	1-7-6 Far Face 108 lb 287 lb 0 lb 0 lb 1-8-14 to 12-2-12 (Span)0-11-4 Top 15 PSF 40 PSF 0 PSF 0 PSF

required at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Notes

Celculated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component sultability of the intended Lumber

Dry service conditions, unless noted otherwise
 Holst not to be treated with fire retardant or corrosive

chemicals

Handling & Installation

Handling & Installation

1. IJoist flanges must not be cut or drifted

2. Refer to latest copy of the IJoist product Information
details for framing detaits, stiffener tables, web hole
chart, bridging details, multi-py f

This design is

Provide lateral support at bearing points to evoid lateral displacement and rotation
 Web stiffeners for point load as shown Minimum point load bearing length>= 3.5 inches
 For fat roofs properly
 READ ALL NOTES ON

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT **CONTAINS SPECIFICATIONS AND CRITERIA USED** IN THE DESIGN OF THIS COMPONENT.

Manufacturer Info

Nascor by Kott



isDesign™

GREENPARK Client:

Project:

Address:

9/7/2018 Date:

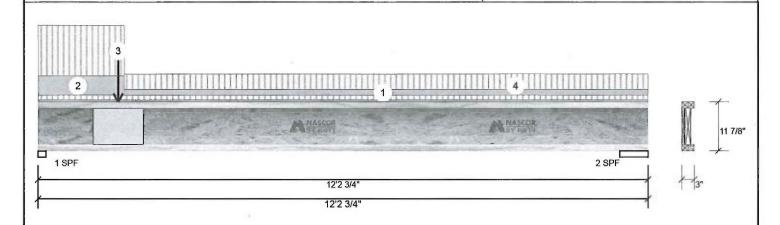
RO Designer:

Job Name: MILLWOOD 2-ELEV 1

Project #:

2-Ply - PASSED NJ 11.875"

Level: Ground Floor



Member Inf	ormation						Unfactored Reactions UNPATTERNED Ib (Uplift)						
Туре:	Girder		Application	n: Fl	oor (Resident	iał)	Brg	Live		Dead	Sno	W	Wind
Plies:	2		Design M	ethod: LS	SD .		1	471		177		0	0
Moisture Cond	lition: Dry		Building C	Code: NI	BCC 2010 / O	BC 2012	2	206		77		0	0
Deflection LL:	360		Load Sha	ring: No)		1						
Deflection TL:	240		Deck:	No	ot Checked								
Importance:	Normal		Vibration:	No	ot Checked								
General Load													
Floor Live:	40 PSF						Bearing	s and Fact	tored	Reactions			
Dead:	15 PSF		ŀ				Bearing	Length	Сар.	React D/L lb	Total	Ld. Case	Ld. Comb.
							1-SPF	1.875"	35%	221 / 707	928	L	1.25D+1.5L
							2 - SPF	6.875"	12%	96 / 308	405	L	1.25D+1.5L
Analysis Res	sults											_	
Analysis	Actual	Location	Allowed	Capacity	Comb.	Case	1				/	- EESSIO	
Moment	1410 ft-lb	4'3 1/4"	9020 ft-lb	0.156 (16%)	1.25D+1.5L	L					108	OFESSIO	MAL
Unbraced	1410 ft-lb	4'3 1/4"	1412 ft-lb	0.998 (100%)	1.25D+1.5L	L				/	Sal C		SE S
Shear	915 lb	1 1/8"	3400 lb	0.269 (27%)	1.25D+1.5L	L				1	W -	TI WIS	E m
Perm Defl in.	0.015 (L/9004)	5'5 11/16"	0.388 (L/360)	0.040 (4%)	D	Uniform					, F	1000835	66 30
					90		1				- 1	1000000	44

Analysis Results

Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
Moment	1410 ft-lb	4'3 1/4"	9020 ft-lb	0.156 (16%)	1.25D+1.5L	L
Unbraced	1410 ft-lb	4'3 1/4"	1412 ft-lb	0.998 (100%)	1.25D+1.5L	L
Shear	915 lb	1 1/8"	3400 lb	0.269 (27%)	1.25D+1.5L	L
Perm Defl in.	0.015 (L/9004)	5'5 11/16"	0.388 (L/360)	0.040 (4%)	D	Uniform
LL Defl inch	0.041 (L/3379)	5'5 11/16"	0.388 (L/360)	0.110 (11%)	L	L
TL Defl inch	0.057 (L/2457)	5'5 11/16"	0.581 (L/240)	0.100 (10%)	D+L	L

Design Notes

- 1 Girders are designed to be supported on the bottom edge only.
- 2 Multiple plies must be fastened together as per manufacturer's details.
- 3 Top loads must be supported equally by all plies.
- 4 Top flange must be laterally braced at a maximum of 5'11" o.c.
- 5 Bottom flange braced at bearings.

ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
" ^D									Comments
1	Tie-In	0-0-0 to 12-2-12	(Span)0-3-12	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
2	Tie-In	0-0-0 to 1-8-14	(Span)3-3-0	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
3	Point	1-7-6		Near Face	106 lb	282 lb	0 lb	0 lb	F10
4	Tie-In	1-8-14 to 12-2-12	(Span) 0-11-12	Тор	15 PSF	40 PSF	0 PSF		ru Framing Squash Block is l at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Notes

Calculated Structured Designs is responsible only of the structural adequacy of this compenent based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads.

Dry service conditions, unless noted otherwise
 IJoist not to be treated with fire retardant or corrosive

chemicals

Handling & Installation

- andling & installation
 Lioist flanges must not be cut or drilled
 Refer to letest copy of the Lioist product information
 details for framing details, stiffener tables, web hote
 chart, bridging details, multi-ply fastening details and
 handling-drection details
 Dannaged Lioist must not be used
- Design assumes top flange to be laterally restrained by attached sheathing or as specified in engineering notes.

This design is

Provide lateral support at bearing points to avoid lateral displacement and rotation
 Was stiffeners for point load as shown Minimum point load bearing length>= 3.5 inches
 For flat roofs proporting
 READ ALL NOTES ON

READ ALL NOTES ON THIS PAGE AND ON THE CONTAINS SPECIFICATIONS AND CRITERIA USED

Manufacturer Info

Nascor by Kott

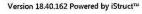
ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT IN THE DESIGN OF THIS COMPONENT.

Kott Lumber Company 14 Anderson Blvd, Ontario Canada K2H7V1 905-642-4400

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September 13, 2018









Client: **GREENPARK**

Project:

Address:

Date: 9/7/2018

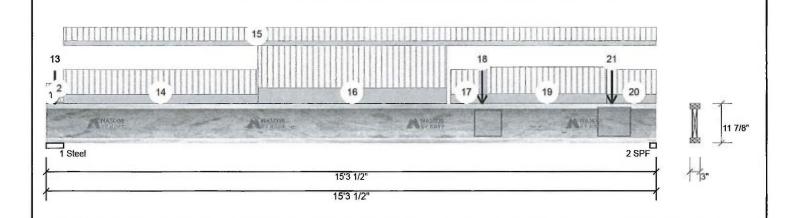
Designer: RO

Job Name: MILLWOOD 2-ELEV 1

Project #:

NJ 11.875" 2-Ply - PASSED Level: Ground Floor

Unfactored Reactions UNPATTERNED Ib (Uplift)



Type:	Girder	Application:	Floor (Residential)	Brg	Live		Dead	Snov	W	Wind
Plies:	2	Design Method:	LSD	1	641		269		0	0
Moisture Condition	n: Dry	Building Code:	NBCC 2010 / OBC 2012	2	539		202		0	0
Deflection LL:	360	Load Sharing:	No							
Deflection TL:	240	Deck:	Not Checked							
Importance:	Normal	Vibration:	Not Checked							
General Load										
Floor Live:	40 PSF			Bearings a	and Facto	ored R	eactions			
Dead:	15 PSF			Bearing L	ength	Cap. F	React D/L lb	Total	Ld. Case	Ld. Comb.
				1 - Steel 5.	.250"	38%	337 / 961	1298	L	1.25D+1.5L
				2-SPF 1	.875"	40%	253 / 809	1061	L	1.25D+1.5L

Analysis Results

Member Information

Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
Moment	3724 ft-lb	8' 3/16"	9020 ft-lb	0.413 (41%)	1.25D+1.5L	L
Unbraced	3724 ft-lb	8' 3/16"	3737 ft-lb	0.997 (100%)	1.25D+1.5L	L
Shear	1052 lb	15'2 3/8"	3400 lb	0.309 (31%)	1.25D+1.5L	L
Perm Defl in.	0.062 (L/2891)	7'10 3/8"	0.494 (L/360)	0.120 (12%)	D	Uniform
LL Defl inch	0.164 (L/1083)	7'10 3/8"	0.494 (L/360)	0.330 (33%)	L	L
TL Defl inch	0.226 (L/788)	7'10 3/8"	0.741 (L/240)	0.300 (30%)	D+L	L.

Design Notes

- 1 Girders are designed to be supported on the bottom edge only.
- 2 Multiple plies must be fastened together as per manufacturer's details.
- 3 Top loads must be supported equally by all plies.
- 4 Top flange must be laterally braced at a maximum of 3'9" o.c.

5 Bottom flange braced at bearings

J DUMOIT	nange braced at bearings.								
ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Tie-In	0-0-0 to 0-5-4	(Span)0-3-12	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
2	Tie-In	0-0-0 to 0-5-4	(Span)0-8-4	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
3	Point	0-2-10		Тор	1 lb	3 lb	0 lb	0 lb	J7
4	Point	0-2-10		Тор	1 lb	4 lb	0 lb	0 lb	J7
5	Point	0-2-10		Тор	1 lb	3 lb	0 lb	0 lb	J7
6	Point	0-2-10		Тор	1 lb	0 lb	0 lb	0 lb	Wall Self Weight
7	Point	0-2-10		Тор	21 lb	56 lb	0 lb	0 lb	J7
ontinued or	n page 2								

Notes Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the coetractor to ensure the component suitability of the intended application, and to verify the dimensions and loads.

Lumber

Dry service conditions, unless noted otherwise
 Uoist not to be treated with fire retardant or continuous.

Handling & Installation

- Handling & Installation

 1. Joist flarges must not be cut or drilled

 2. Refer to latest copy of the IJoist product information
 details for framing details, stifferer fables, web hote
 chart. bridging details, multi-ply fastening dutals and
 handling/erection details

 3. Damaged floists must not be used

 4. Design assumes top flange to be laterally restrained
 by attached sheathing or as specified in engineering
 notes.

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT **CONTAINS SPECIFICATIONS AND CRITERIA USED** IN THE DESIGN OF THIS COMPONENT.

Provide lateral support at bearing points to avoid lateral displacement and rotation.
 Web stiffeness for point load as shown Minimum point load bearing anothers 3.5 inches
 For flat roofs provide READ ALL NOTES Of ponding.

Manufacturer Info Nascor by Kott

Kott Lumber Company 14 Anderson Blvd, Ontario Canada K2H7V1 905-642-4400



T.L. WISE

100083566

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September 13, 2018

This design is



Page 2 of 2



Client: **GREENPARK**

Project: Address:

Date: 9/7/2018

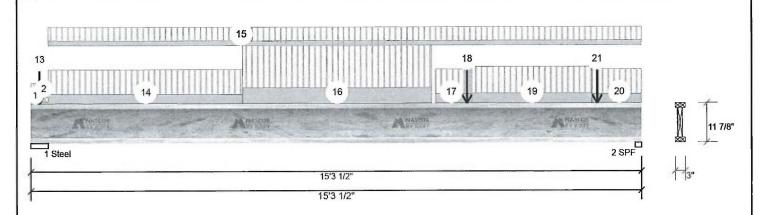
Designer: RO

Job Name: MILLWOOD 2-ELEV 1

Project #:

11.875" 2-Ply - PASSED NJ

Level: Ground Floor



Continued	from page 1							1,100,100	30
ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
8	Point	0-2-10		Тор	22 lb	59 lb	0 lb	0 lb	J7
9	Point	0-2-10		Тор	2 lb	5 lb	0 lb	0 lb	J7
10	Point	0-2-10		Тор	20 lb	0 lb	0 lb	0 lb	Wall Self Weight
11	Point	0-2-10		Тор	9 lb	25 lb	0 lb	0 lb	J7
12	Point	0-2-10		Тор	10 lb	26 lb	0 lb	0 lb	J7
13	Point	0-2-10		Тор	9 lb	0 lb	0 lb	0 lb	Wall Self Weight
14	Tie-In	0-5-4 to 5-3-10	(Span)1-7-15	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
15	Tie-In	0-5-4 to 15-3-8	(Span) 0-10-12	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
16	Tie-In	5-3-10 to 10-0-8	(Span)2-9-15	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
17	Tie-In	10-1-10 to 11-0-10	(Span)1-7-15	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
18	Point	10-11-2		Far Face	18 lb	49 lb	0 lb	0 lb	F9
19	Tie-In	11-0-10 to 14-0-10	(Span)1-9-8	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
20	Tie-In	14-0-10 to 15-3-8	(Span)1-7-15	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
21	Point	14-2-2		Far Face	25 lb	66 lb	0 lb	0 lb	F9

Pass-Thru Framing Squash Block is required at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads.

Lumber

Dry service conditions, unless noted otherwise
 Uoist not to be treated with fire retardant or corrosive

chemicals

Handling & Installation

Handling & Installation

1. Molet flanges must not be cut or drilled

2. Refer to latest copy of the Lloist product information details for framing details, sufferent tables, web hole toher, bridging details, multi-lips presenting details and handling/errection details

3. Damaged loists must not be used

4. Design assumes top flange to be laterally restrained by attached shealthing or as specified in engineering notics.

Provide lateral support at bearing points to exist lateral displacement and rotation
 Web stiffeners for point load as shown Minimum point load bearing length>= 3.5 inches
 For flat roots provide proper drainage to prevent ponding

Manufacturer Info Nascor by Kott

Kott Lumber Company 14 Anderson Blvd, Ontario K2H7V1 905-642-4400

This design is valid until 7/10/2021



Client:

Project: Address: GREENPARK

9/7/2018 Date:

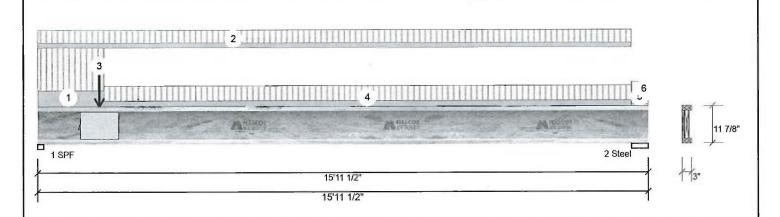
Designer:

Job Name: MILLWOOD 2-ELEV 1

Project #:

2-Ply - PASSED F12-B NJ 11.875"

Level: Ground Floor



Member Infor	mation			Unfactored Reactions UNPATTERNED Ib (Uplift)					
Type:	Girder	Application:	Floor (Residential)	Brg	Live	Dead	Snow	Wind	
Plies:	2	Design Method:	LSD	1	712	267	0	0	
Moisture Conditio	n: Dry	Building Code:	NBCC 2010 / OBC 2012	2	376	141	0	0	
Deflection LL:	360	Load Sharing:	No						
Deflection TL:	240	Deck:	Not Checked						
Importance:	Normal	Vibration:	Not Checked						
General Load									
Floor Live:	40 PSF			Bearings a	nd Facto	ored Reactions			
Dead:	15 PSF			Bearing Le	ength	Cap. React D/L lb	Total Ld. Case	Ld. Comb.	
				1 - SPF 1.	875"	53% 334 / 1068	1402 L	1.25D+1.5L	
				2 - Steel 5.	250"	22% 176 / 563	739 L	1.25D+1.5L	

Analysis Results

Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
Moment	3112 ft-lb	6'11 1/2"	9020 ft-lb	0.345 (34%)	1.25D+1.5L	L
Unbraced	3112 ft-lb	6'11 1/2"	3135 ft-lb	0.993 (99%)	1.25D+1.5L	L
Shear	1386 lb	1 1/8"	3400 lb	0.408 (41%)	1.25D+1.5L	L
Perm Defl in.	0.057 (L/3233)	7'6 13/16"	0.516 (L/360)	0.110 (11%)	D	Uniform
LL Defl inch	0.153 (L/1213)	7'6 13/16"	0.516 (L/360)	0.300 (30%)	L	L
TL Defl inch	0.211 (L/882)	7'6 13/16"	0.774 (L/240)	0.270 (27%)	D+L	L

Design Notes

- 1 Girders are designed to be supported on the bottom edge only.
- 2 Multiple plies must be fastened together as per manufacturer's details.
- 3 Top loads must be supported equally by all plies.
- 4 Top flange must be laterally braced at a maximum of 4'2" o.c.

5 Bottom flange braced at bearings.



O DOMONIA	marige bracea at bearing	, o.							
ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Tie-In	0-0-0 to 1-8-14	(Span)3-3-0	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
2	Tie-In	0-0-0 to 15-6-4	(Span) 0-11-12 to 0-11-12	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
3	Point	1-7-6		Near Face	129 lb	343 lb	0 lb	0 lb	F10 ru Framing Squash Block is
4	Tie-In	1-8-14 to 15-6-4	(Span)1-1-12 to 1-1-12	Тор	15 PSF	40 PSF	0 PSF	required	at all point loads over bearings
5	Tie-In	15-6-4 to 15-11-8	(Span)0-5-4	Тор	15 PSF	40 PSF	0 PSF	Refersto	Multiple Member Connection
6	Tie-In	15-6-4 to 15-11-8	(Span) 0-10-12	Тор	15 PSF	40 PSF	0 PSF	Details fo requiren	r ply to ply nailing or bolting nents

Notes

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the inlended application, and to verify the dimensions and loads.

Dry service conditions, unless noted otherwise
 IJoist not to be treated with fire retardant or corrosive

Handling & Installation

- landling & Installation

 . Befer to latest copy of the IJoist product information details for framing details, stiffener tables, web hole chart. bridging details, sufficient tables, web hole chart, bridging details, multi-ply fastening details and handling/erection details

 . Damaged IJoist must not be used
 . Design assumes top flange to be laterally restrained by attached sheathing or as specified in engineering notes.

Provide lateral support at bearing points to avoid lateral displacement and rotation
 Web stiffeners for point load as shown Minimum point load bearing length>= 3.5 inches
 For flat roofs proportion

This design is

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.

Manufacturer Info Nascor by Kott





Client:

GREENPARK Project:

Address:

9/7/2018 Date:

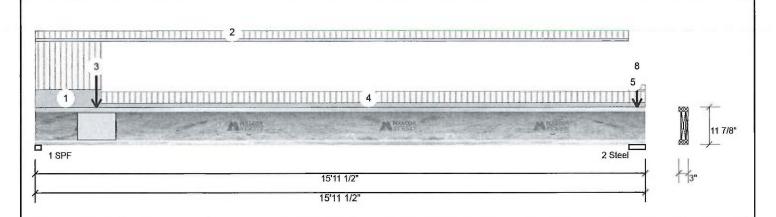
RO Designer:

Job Name: MILLWOOD 2-ELEV 1

Project #:

NJ 2-Ply - PASSED F12-C 11.875"

Level: Ground Floor



Member Infor	mation			Unfactored Reactions UNPATTERNED Ib (Uplift)						
Type:	Girder	Application:	Floor (Residential)	Brg	Live		Dead	Snow		Wind
Plies:	2	Design Method:	LSD	1	649		244	0		0
Moisture Conditio	n: Dry	Building Code:	NBCC 2010 / OBC 2012	2	417		179	0	r)	0
Deflection LL:	360	Load Sharing:	No							
Deflection TL:	240	Deck:	Not Checked							
Importance:	Normal	Vibration:	Not Checked							
General Load										
Floor Live:	40 PSF			Bearings a	ind Facto	ored F	Reactions			
Dead:	15 PSF			Bearing L	ength	Cap.	React D/L lb	Total	Ld. Case	Ld. Comb.
				1 - SPF 1.	.875"	48%	305 / 973	1278	L	1.25D+1.5L
				2 - Steel 5.	.250"	25%	223 / 625	849	L	1.25D+1.5L

Analysis Results

rinary sis ite.	, at to					
Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
Moment	2271 ft-lb	6'1 5/8"	9020 ft-lb	0.252 (25%)	1.25D+1.5L	L
Unbraced	2271 ft-lb	6'1 5/8"	2271 ft-lb	1.000 (100%)	1.25D+1.5L	L
Shear	1264 lb	1 1/8"	3400 lb	0.372 (37%)	1.25D+1.5L	L
Perm Defl in.	0.042 (L/4432)	7'4 5/8"	0.516 (L/360)	0.080 (8%)	D	Uniform
LL Defl inch	0.112 (L/1664)	7'4 3/4"	0.516 (L/360)	0.220 (22%)	L	L
TL Defl inch	0.154 (L/1210)	7'4 3/4"	0.774 (L/240)	0.200 (20%)	D+L	L



Design Notes

- 1 Girders are designed to be supported on the bottom edge only.
- 2 Multiple plies must be fastened together as per manufacturer's details.
- 3 Top loads must be supported equally by all plies.
- 4 Top flange must be laterally braced at a maximum of 4'10" o.c.

5 Bottom flange braced at bearings

o Dolloin i	nailye biaced at bearing	go.							
ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Tie-In	0-0-0 to 1-8-14	(Span)3-3-0	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
2	Tie-In	0-0-0 to 15-6-4	(Span)0-6-4 to 0-6-4	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
3	Point	1-7-6		Far Face	152 lb	404 lb	0 lb	0 lb	F10
4	Tie-In	1-8-14 to 15-11-8	(Span)0-9-4 to 0-9-4	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
5	Tie-In	15-6-4 to 15-11-8	(Span)0-3-12	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
6	Point	15-8-14		Тор	32 lb	85 lb	0 lb	0 lb	J7

Continued on page 2...

Notes

Calculated Shuctured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads.

Lumber

Dry service conditions, unless noted otherwise
 Uolst not to be treated with fire retardant or corrosive

Handling & Installation

Handling & Installation

1. Julist flanges must not be cut or drilled

2. Refer to latest copy of the Julist product information details for framing details, stiffener tables, web hole chart, bridging details, multi-ply fastening details and handlingferection details

3. Demaged Julists must not be used

4. Design assumes top flange to be laterally restrained by attached sheathing or as specified in engineering notes.

This design is

Provide lateral support at bearing points to avoid lateral displacement and rotation
 Web stiffeners for point load as shown Minimum point load bearing length>= 3.5 inches
 For flat roofs pro

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.

Nascor by Kott

Manufacturer Info

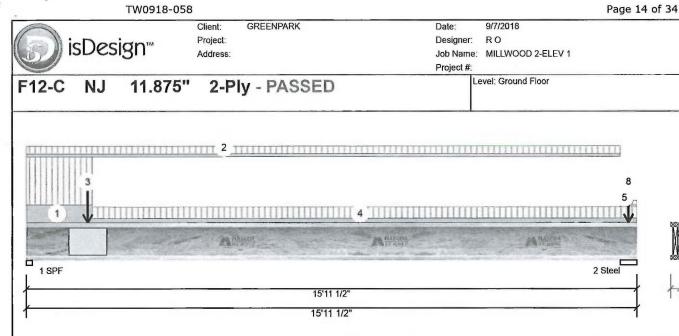
Kott Lumber Company 14 Anderson Blvd, Ontario Canada K2H7V1 905-642-4400



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Page 2 of 2



Continued	I from page 1								
ID	Load Type	Location Trib Width	Side	Dead	Live	Snow	Wind	Comments	
7	Point	15-8-14	Тор	30 lb	80 lb	0 lb	0 lb	J7	
8	Point	15-8-14	Тор	22 lb	0 lb	0 lb	0 lb	Wall Self Weight	

Pass-Thru Framing Squash Block is required at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Notes

Calculated Struchared Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the Inlended application, and to verify the dimensions and loads.

Lumber

Dry service conditions, unless noted otherwise
 Unist not to be treated with fire retardant or corr

Handling & Installation

Handling & Installation

1. Juloist flanges must not be cut or drilled

2. Refer to latest copy of the Juloist product information details for framing details, stiffener tables, web hole chart, bridging details, multi-ply fastening details and handling/erection details

3. Damaged Juloists must not be used

4. Design assumes top flange to be laterally restrained by attached sheathing or as specified in engineering notes.

Provide taleral support at bearing points to avoid lateral displacement and rotation
 Web stiffeners for point load as shown Minimum point load bearing lengths—3.5 inches
 For flat roofs provide proper drainage to prevent

This design is valid until 7/10/2021

Manufacturer Info

Nascor by Kott





GREENPARK Client:

Address:

Project:

9/10/2018 Date:

Designer: RO

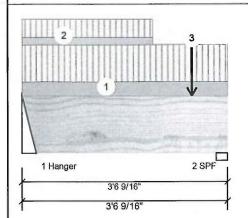
Job Name: MILLWOOD 2-ELEV 1

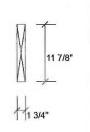
Project #:

Forex 2.0E-3000Fb LVL

1.750" X 11.875" - PASSED

Level: Ground Floor





Page 1 of 1

Member Infor	mation			Unfactored Reactions UNPATTERNED lb (Uplift)							
Туре:	Girder	Application:	Floor (Residential)	Brg	Live		Dead	Snow	/	Wind	
Plies:	1	Design Method:	LSD	1	555		218	0)	0	
Moisture Condition	n: Dry	Building Code:	NBCC 2010 / OBC 2012	2	510		201	0)	0	
Deflection LL:	360	Load Sharing:	No	-							
Deflection TL:	240	Deck:	Not Checked								
Importance:	Normal	Vibration:	Not Checked	1							
General Load		1,000,000									
Floor Live:	40 PSF			Bearing	s and Fac	tored F	Reactions				
Dead:	15 PSF			Bearing	Length	Сар.	React D/L lb	Total	Ld. Case	Ld. Con	ıb.
				1 - Hanger	3.000"	28%	272 / 833	1106	L	1.25D+1	.5L
Analysis Resul	nalysis Results			2-SPF	2.375"	40%	251 / 765	1016	L	1.25D+1	.5L

Analysis Kes	suits					
Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
Moment	785 ft-lb	1'9 5/16"	17130 ft-lb	0.046 (5%)	1.25D+1.5L	L
Unbraced	785 ft-lb	1'9 5/16"	13259 ft-lb	0.059 (6%)	1.25D+1.5L	L
Shear	745 lb	2'5 1/16"	5798 lb	0.129 (13%)	1.25D+1.5L	L
Perm Defl in.	0.001 (L/26669)	1'9 7/16"	0.108 (᠘360)	0.010 (1%)	D	Uniform
LL Defl inch	0.004 (L/10472)	1'9 3/8"	0.108 (L/360)	0.030 (3%)	L	L
TL Defl inch	0.005 (L/7520)	1'9 3/8"	0.161 (L/240)	0.030 (3%)	D+L	L



Design Notes

- 1 Fill all hanger nailing holes.
- 2 Girders are designed to be supported on the bottom edge only.
- 3 Top braced at bearings.

4 Bottom braced at bearings Trib Width Side Dead Live Snow Wind Comments ID Load Type Location

210 PLF OPLE OPIF **79 PLF** Part. Uniform 0-0-0 to 3-6-9 Top 0-0-0 to 2-3-3 **39 PLF** 103 PLF 0 PLF 0 PLF Part. Uniform Near Face 2 33 lb 87 lb 0 lb J2 Point 2-11-3 Near Face 3

> Self Weight 5 PLF

Pass-Thru Framing Squash Block is required at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Calcutated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. If is the responsibility of the customer and/or the contractor to ensure the component suitability of the inlended application, and to verify the dimensions and loads. Lumber

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or corrosive

chemicals

Handling & Installation

LIVIL beams must not be cut or drilled
Refer to manufacturer's product information
regarding installation requirements, multi-ply
fastening details, beam strength values, and code

restelling delaws, beam sureigni values, and code approvals
Damaged Beams must not be used
Design assumes top edge is laterally restrained
Provide lateral support at bearing points to avoid lateral displacement and rotation

For flat roofs provide proper drainage to prevent ponding

This design is va

Manufacturer Info Forex APA: PR-L318

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





GREENPARK

Project: Address:

Date:

9/7/2018

RO Designer:

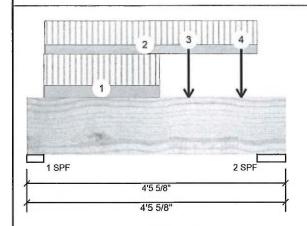
Job Name: MILLWOOD 2-ELEV 1

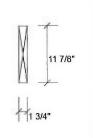
Project #:

Forex 2.0E-3000Fb LVL

1.750" X 11.875" - PASSED

Level: Ground Floor





Page 1 of 1

Aember Info	rmation			Unfactor	ed React	tions UNPAT	TERNED I	b (Uplift)	
Type:	Girder	Application:	Floor (Residential)	Brg	Live	Dead	S	now	Wind
Plies:	1	Design Method:	LSD	1	1024	395		0	0
Moisture Condition	on: Dry	Building Code:	NBCC 2010 / OBC 2012	2	1099	424		0	0
Deflection LL:	360	Load Sharing:	No						
Deflection TL:	240	Deck:	Not Checked						
Importance:	Normal	Vibration:	Not Checked						
General Load									
Floor Live:	40 PSF			Bearings	and Fac	tored Reacti	ons		
Dead:	15 PSF			Bearing I	Length	Cap. React	D/L lb To	tal Ld. Case	Ld. Comb.
				1-SPF 3	3.500"	54% 493	/ 1536 20	29 L	1.25D+1.5L
	Total Control			2-SPF :	5.875"	34% 529	/ 1649 21	78 L	1.25D+1.5L

Analysis Results

Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
Moment	2002 ft-lb	2'1 9/16"	17130 ft-lb	0.117 (12%)	1.25D+1.5L	L
Unbraced	2002 ft-lb	2'1 9/16"	11720 ft-lb	0.171 (17%)	1.25D+1.5L	L
Shear	2314 lb	3' 5/8"	5798 lb	0.399 (40%)	1.25D+1.5L	L
Perm Defl in.	0.004 (L/10769)	2'1 11/16"	0.127 (L/360)	0.030 (3%)	D	Uniform
LL Defl inch	0.011 (L/4138)	2'1 11/16"	0.127 (L/360)	0.090 (9%)	L	L
TL Defl inch	0.015 (L/2989)	2'1 11/16"	0.191 (L/240)	0.080 (8%)	D+L	L



September 13, 2018

U	e	SI	g	ın	N	Ю	τes	
_	_	_	_	_				•

- 1 Girders are designed to be supported on the bottom edge only.
- 2 Top braced at bearings.
- 3 Bottom braced at bearings.

ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Part. Uniform	0-3-8 to 2-3-8		Near Face	120 PLF	319 PLF	0 PLF	0 PLF	
2	Part. Uniform	0-3-12 to 3-11-12		Тор	90 PLF	240 PLF	0 PLF	0 PLF	
3	Point	2-9-8		Near Face	115 lb	305 lb	0 lb	0 lb	J7
4	Point	3-8-8		Near Face	112 lb	300 lb	0 lb	0 lb	J7
	Self Weight				5 PLF			Pass-Th	ru Framing S

Squash Block is required at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Notes

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shoon. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads.

Lumber

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or continuous.

Handling & Installation

- LVL beams must not be cut or drilled Refer to manufacturer's product information regarding installation requirements, multi-ply fastening details, beam strength values, and code engroyals
- approvals

 Damaged Beams must not be used

 Design assumes top edge is laterally restrained

 Provide lateral support at bearing points to avoid

 lateral displacement and rotation

For flat roofs provide proper drainage to prevent ponding

This design is

Manufacturer Info Forex APA: PR-L318

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.

Kott Lumber Company 14 Anderson Blvd, Ontario Canada K2H7V1 905-642-4400

Version 18.40.162 Powered by iStruct™



TW0918-058 Client: Project: isDesign[™] Address: Forex 2.0E-3000Fb LVL 2 1 SPF Member Information Girder

GREENPARK

Date: Designer:

9/7/2018 RO

Job Name: MILLWOOD 2-ELEV 1

Project #

1.750" X 11.875" - PASSED

Level: Ground Floor

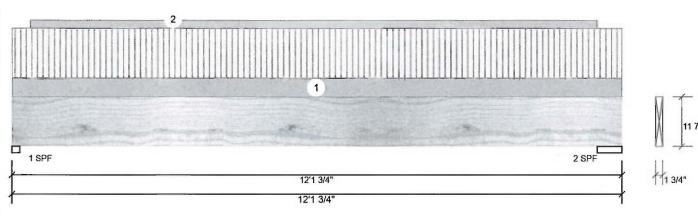
Unfactored Reactions UNPATTERNED lb (Uplift)

Live

Dead

Snow

Wind



Floor (Residential)

Plies:	1	Design Method:	LSD	1	73	67	0		0
Moisture Condition	on: Dry	Building Code:	NBCC 2010 / OBC 2012	2	77	70	0		0
Deflection LL:	360	Load Sharing:	No						
Deflection TL:	240	Deck:	Not Checked						
Importance:	Normal	Vibration:	Not Checked						
General Load									
Floor Live:	40 PSF			Bearings ar	nd Factored	Reactions			
Dead:	15 PSF			Bearing Lei	ngth Cap.	React D/L lb	Total I	Ld. Case	Ld. Comb.
				1 - SPF 1.8	75" 10%	83 / 109	192 l	L	1.25D+1.5L
				2-SPF 58	75" 3%	88 / 115	203		1.25D+1.5L

Brg

Analysis Results

Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
Moment	553 ft-lb	5'10 7/8"	17130 ft-lb	0.032 (3%)	1.25D+1.5L	L
Unbraced	553 ft-lb	5'10 7/8"	3868 ft-lb	0.143 (14%)	1.25D+1.5L	L
Shear	158 lb	1'1"	5798 lb	0.027 (3%)	1.25D+1.5L	L
Perm Defl in.	0.011 (L/13107)	5'10 7/8"	0.388 (L/360)	0.030 (3%)	D	Uniform
LL Defl inch	0.012 (L/12101)	5'10 7/8"	0.388 (L/360)	0.030 (3%)	L	L
TL Defl inch	0.022 (L/6292)	5'10 7/8"	0.581 (L/240)	0.040 (4%)	D+L	L

Application:

T.L. WISE 100083566 100083566 WCE OF ON September 13, 2018

Design Notes

1 Girders are designed to be supported on the bottom edge only.

2 Top braced at bearings.

3 Bottom braced at bearings.

ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Tie-In	0-0-0 to 12-1-12	(Span)0-7-6	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
2	Part, Uniform	0-4-6 to 11-7-15		Тор	2 PLF	0 PLF	0 PLF	0 PLF	
	Self Weight				5 PLF				

Pass-Thru Framing Squash Block is required at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads. Lumber

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or corrosive

chemicals

Handling & Installation

And Impact in the cut or drilled Refer to manufacturer's product information regarding installation requirements, multi-ply fastering details, beam strength values, and code

restering details, beam strength values, and approvals

Damaged Beams must not be used

Design assumes top edge is laterally restreined

Provide lateral support at bearing points to lateral displacement and rotation

For flat roofs provide proper drainage to prevent ponding

Manufacturer Info

Forex APA: PR-L318

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.

This design is



Client:

Project: Address: **GREENPARK**

Date: Designer: 9/7/2018

RO

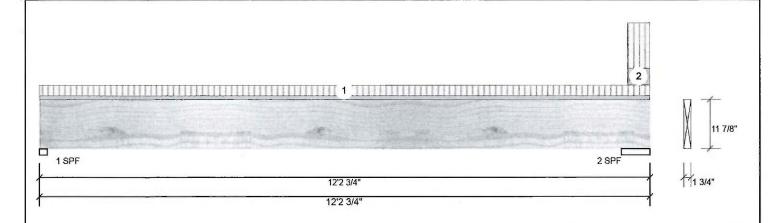
Job Name: MILLWOOD 2-ELEV 1

Project #:

Forex 2.0E-3000Fb LVL

1.750" X 11.875" - PASSED

Level: Ground Floor



Vlember Info	rmation			Unfacto	red Reac	tions U	INPATTERN	ED lb (Uplift)	
Type:	Girder	Application:	Floor (Residential)	Brg	Live		Dead	Snov	,V	Wind
Plies:	1	Design Method:	LSD	1	67		53		0	0
Moisture Condition	on: Dry	Building Code:	NBCC 2010 / OBC 2012	2	95		66		0	0
Deflection LL:	360	Load Sharing:	No							
Deflection TL:	240	Deck:	Not Checked	1						
Importance:	Normal	Vibration:	Not Checked							
General Load										
Floor Live:	40 PSF			Bearing	s and Fac	tored	Reactions			
Dead:	15 PSF			Bearing	Length	Cap.	React D/L lb	Total	Ld. Case	Ld. Comb.
				1-SPF	1.875"	8%	67 / 101	168	L	1.25D+1.5L
				2-SPF	6.875"	3%	82 / 142	224	L	1.25D+1.5L

Analysis Results

Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
Moment	480 ft-lb	5'10 7/8"	17130 ft-lb	0.028 (3%)	1.25D+1.5L	L
Unbraced	480 ft-lb	5'10 7/8"	3868 ft-lb	0.124 (12%)	1.25D+1.5L	L
Shear	137 lb	1'1"	5798 lb	0.024 (2%)	1.25D+1.5L	L
Perm Defl in.	0.008 (L/16496)	5'10 7/8"	0.388 (L/360)	0.020 (2%)	D	Uniform
LL Defl inch	0.011 (L/13065)	5'10 7/8"	0.388 (L/360)	0.030 (3%)	L	L
TL Defl inch	0.019 (L/7290)	5'10 7/8"	0.581 (L/240)	0.030 (3%)	D+L	L

WISE THE 100083566 WCE OF OUT September 13, 2018

Design Notes

- 1 Girders are designed to be supported on the bottom edge only.
- 2 Top braced at bearings.
- 3 Bottom braced at bearings.

ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Tie-In	0-0-0 to 12-2-12	(Span)0-6-14	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
2	Tie-In	11-9-6 to 12-2-12	(Span)2-6-2	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
	Self Weight				5 PLF				

Pass-Thru Framing Squash Block is required at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Notes

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design critieria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads. Lumber

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or cor

Handling & Installation

LVL beams must not be cut or drilled
Refer to manufacturer's product information
regarding installation requirements, multi-phy
fastening details, beam strength values, and code

approvals
Damaged Beams must not be used
Design assumes top edge is laterally restrained
Provide lateral support at bearing points to avoid
lateral displacement and rotation

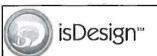
For flat roofs provide proper drainage to prevent ponding

This design is

Manufacturer info Forex

APA: PR-L318

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.



Project:

GREENPARK

Address:

Date: 9/7/2018

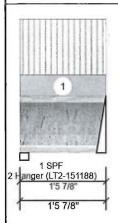
Designer: RO

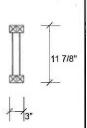
Job Name: MILLWOOD 2-ELEV 1

Project #:

NJ 11.875" 2-Ply - PASSED

Level: Ground Floor





Page 1 of 1

Member Inform	ember Information						Unfactored Reactions UNPATTERNED Ib (Uplift)						
Type:	Girder	Application:	Floor (Residential)	Brg	Live		Dead	Snov	N	Wind			
Plies:	2	Design Method:	LSD	1	48		18		0	0			
Moisture Condition:	Dry	Building Code:	NBCC 2010 / OBC 2012	2	49		18		0	0			
Deflection LL:	360	Load Sharing:	No										
Deflection TL:	240	Deck:	Not Checked										
Importance:	Normal	Vibration:	Not Checked										
General Load													
Floor Live:	40 PSF			Bearing	s and Fac	tored	Reactions						
Dead:	15 PSF			Bearing	Length	Cap.	React D/L lb	Total	Ld. Case	Ld. Comb.			
				1 - SPF	1.875"	4%	23/72	95	L	1.25D+1.5L			
Analysis Result	s			2 - Hanger	2.000"	4%	23 / 73	96	L	1.25D+1.5L			

Analysis Results

ľ	Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
	Moment	27 ft-lb	8 7/8"	9020 ft-lb	0.003 (0%)	1.25D+1.5L	L
	Unbraced	27 ft-lb	8 7/8"	8539 ft-lb	0.003 (0%)	1.25D+1.5L	L
l	Shear	83 lb	1 1/8"	3400 lb	0.024 (2%)	1.25D+1.5L	L
	Perm Defl in.	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)		
	LL Defl inch	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)		
	TL Defl inch	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)		

Design Notes

- 1 Fill all hanger nailing holes.
- 2 Girders are designed to be supported on the bottom edge only.
- 3 Multiple plies must be fastened together as per manufacturer's details.
- 4 Top loads must be supported equally by all plies.
- 5 Top flange braced at bearings.
- 6 Bottom flange braced at bearings.

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September 13, 2018

ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Tie-In	0-0-0 to 1-5-14	(Span)3-3-0	Тор	15 PSF	40 PSF	0 PSF	0 PSF	

Pass-Thru Framing Squash Block is required at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Notes

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads. Lumber

Dry service conditions, unless noted otherwise
 Uoist not to be treated with fire retardant or corrosive

chemicals

Handling & Installation

- andling & Installation.

 Joist flanges must not be cut or drilled.
 Refer to latest copy of the IJoist product information details for framing details, stifferent tables, web note chart, bridging details, multi-phy fastening details and handling/erection details.

 Damaged IJoist must not be used.
 Deslign assumes top flange to be laterally restrained by attached sheathing or as specified in engineering notes.
- Provide lateral support at bearing points to avoid lateral displacement and rotation
 Web stiffeness for point load as shown Minimum point load bearing let other 3.5 inches
 To fire flat roots provided to the state of the state

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.

Manufacturer Info

Nascor by Kott

This design is



Project: Address:

Date:

9/7/2018

RO Designer:

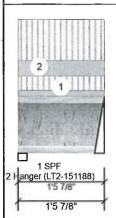
MILLWOOD 2-ELEV 1 Job Name:

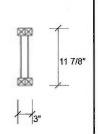
Project #:

NJ 11.875" 2-Ply - PASSED

GREENPARK

Level: Ground Floor





Page 1 of 1

Vlember Info	ormation						Unfacto	red React	ions U	NPATTERN	ED Ib	(Uplift)	
Type:	Girder		Application	on: F	loor (Residen	tial)	Brg	Live		Dead	Sno	w	Wind
Plies:	2		Design M	lethod: L	.SD		1	65		24		0	0
Moisture Condil	tion: Dry		Building	Code: N	NBCC 2010 / C	DBC 2012	2	66		25		0	0
Deflection LL:	360		Load Sha	aring: 1	10								
Deflection TL:	240		Deck:	ľ	Not Checked								
Importance:	Normal		Vibration	: N	Not Checked								
General Load													
Floor Live:	40 PSF						Bearing	s and Fact	ored F	Reactions			
Dead:	15 PSF						Bearing	Length	Cap.	React D/L lb	Total	Ld. Case	Ld. Comb.
							1 - SPF	1.875"	5%	31 / 98	128	L	1.25D+1.5L
Analysis Res	ults	-					2 - Hanger	2.000"	5%	31 / 99	130	L	1.25D+1.5L
Analysis	Actual	Location	Allowed	Capacity	Comb.	Case						_	
Moment	36 ft-lb	8 7/8"	9020 ft-lb	0.004 (0%)	1.25D+1.5L	L					/	FESSIO/	V
Unbraced	36 ft-lb	8 7/8"	8539 ft-lb	0.004 (0%)	1.25D+1.5L	L					68	-	10
Shear	112 lb	1 1/8"	3400 lb	0.033 (3%)	1.25D+1.5L	L				-/	9/		101
Perm Defl in.	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)						1.	× L	L. WIS	- Z
LL Defl inch	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)						1 3	3 7	L. WIS	E E
TL Defl inch	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)						1.	1	000835	66
Design Note	es									/	1	1.01	801
1 Fill all hange	•									1	30	M	CART
	designed to be su		_				1				1	WCE OF C	MIL
	must be fastene			urer's details						S	epter	nber 13	, 2018
	ust be supported			a, b, b dotalic	•					S	epter	nber 13	, 20

ID Load Type Location Trib Width Dead Live Snow Wind Comments 40 PSF 15 PSF 0 PSF 0 PSF Tie-In 0-0-0 to 1-5-14 (Span)1-1-15 Top 40 PSF 2 Tie-In 0-0-0 to 1-5-14 (Span)3-3-0 Top 15 PSF 0 PSF 0 PSF

> Pass-Thru Framing Squash Block is required at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Notes

Calculated Shuchured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the Intended application, and to verify the dimensions and loads. Lumber

5 Top flange braced at bearings. 6 Bottom flange braced at bearings.

Dry service conditions, unless noted otherwise
 Uplish not to be treated with fire retardant or corrosive

Handiing & Installation

- THINDING & INSTALLATION

 1. Juist flanges must not be cut or drilled

 2. Refer to latest copy of the Juist product information details for framing details, stifferen tables, web hole chart, bridging details, multi-ply fastening details and handling ferection details

 3. Damaged lobits must not be used

 4. Design assumes top flangs to be laterally restrained by attached sheathing or as specified in engineering notes.

Provide lateral support at bearing points to avoid lateral displacement and rotation
 Web stiffeners for point load as shown Minimum point load bearing learnines 3.5 inches
 For Bat roofs provider READ ALL NOTES ON

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT **CONTAINS SPECIFICATIONS AND CRITERIA USED**

Manufacturer Info

Nascor by Kott

IN THE DESIGN OF THIS COMPONENT. This design is





Project: Address: GREENPARK

Date: Designer:

9/10/2018 Job Name: MILLWOOD 2-ELEV 1

RO

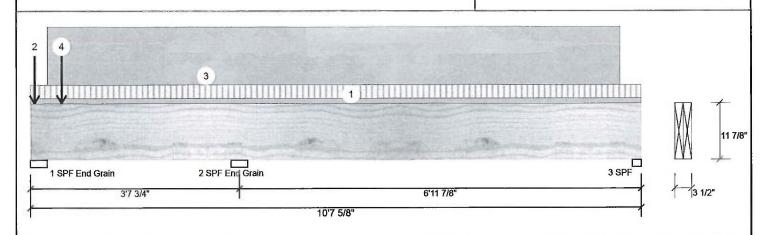
Page 1 of 2

Project #:

F15-A Forex 2.0E-3000Fb LVL

1.750" X 11.875"

2-Ply - PASSED Level: Ground Floor



/lember Info	rmation			Unfacto	red React	tions U	NPATTE
Туре:	Girder	Application:	Floor (Residential)	Brg	Live		Dead
Plies:	2	Design Method:	LSD	1	986		484
Moisture Condition	on: Dry	Building Code:	NBCC 2010 / OBC 2012	2	176		679
Deflection LL:	360	Load Sharing:	No	3	52		259
Deflection TL:	240	Deck:	Not Checked				
Importance:	Normal	Vibration:	Not Checked				
General Load							
Floor Live:	40 PSF			Bearing	s and Fac	tored	Reaction
Dead:	15 PSF			Bearing	Length	Сар.	React D/l
			19	1 - SPF End	3.500"	24%	578 / 1

Analysis Res	ults					
Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
Neg Moment	-617 ft-lb	3'7 3/4"	22269 ft-lb	0.028 (3%)	1.4D	Uniform
Unbraced	-617 ft-lb	3'7 3/4"	22269 ft-lb	0.028 (3%)	1.4D	Uniform
Pos Moment	521 ft-lb	7'9"	22269 ft-lb	0.023 (2%)	1.4D	Uniform
Unbraced	521 ft-lb	7'9"	21873 ft-lb	0.024 (2%)	1.4D	Uniform
Shear	421 lb	4'7 5/8"	7537 lb	0.056 (6%)	1.4D	Uniform
Perm Defl in.	0.005 (L/17692)	7'3 7/16"	0.230 (L/360)	0.020 (2%)	D	Uniform
LL Defi inch	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)		
TL Defl inch	0.006 (L/14724)	7'3 3/8"	0.345 (L/240)	0.020 (2%)	D+L	工

Design Notes

- 1 Performed Secondary Bearing Check (CSA 086-14 6.5.7.3). Assumed point load size: beam width X 4.5.
- 2 Girders are designed to be supported on the bottom edge only.
- 3 Multiple plies must be fastened together as per manufacturer's details.
- 4 Top loads must be supported equally by all plies.
- 5 Top braced at bearings.
- 6 Bottom braced at bearings.
- 7 Lateral slenderness ratio based on full section width.

ERNED Ib (Uplift)

Brg	Live	Dead	Snow	Wind
1	986	484	0	0
2	176	679	0	0
3	52	259	0	0
1				

ns

Bearing	Length	Cap.	React D/L lb	Total	Ld. Case	Ld. Comb.
1 - SPF End Grain	3.500"	24%	578 / 1504	2082	L_	1.25D+1.5L
2 - SPF End Grain	3.500"	17%	995 / 0	995	Uniform	1.4D
3 - SPF	1.875"	13%	348 / 0	348	Uniform	1.4D



September 13, 2018

Notes

Calculated Shuchired Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the Intended application, and to verify the dimensions and loads.

Lumber

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or continuous.

Handling & Installation

- and ling & Installation.

 LVL beams must not be cut or drilled.
 Refer to manufacturer's product information regarding installation requirements, multi-ply fastening details, beam strength values, and code approvals.

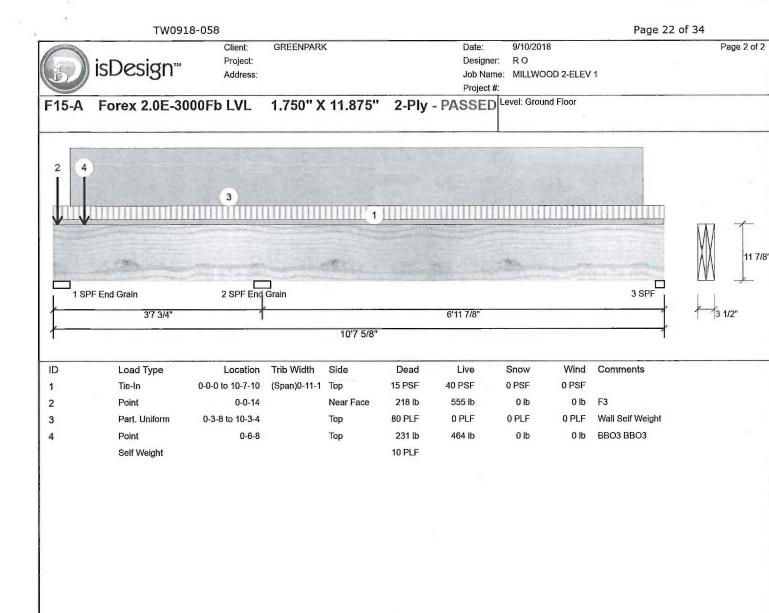
 Damaged Beams must not be used.
 Design assumes top edge is laterally restrained.
 Provide lateral support at bearing points to avoid lateral displacement and rotation.

This design is

Manufacturer Info Forex APA: PR-L318

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





Pass-Thru Framing Squash Block is required at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Notes

Celeurated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads.

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or corrosive

chemicals

Handling & Installation

Andling & Installation
LVL beams must not be cut or drilled
Refer to manufacturer's product information regarding installation requirements, mutit-pit fastening details, beam strength values, and code approvals
Damaged Beams must not be used
Design assumes top edge is laterally restretned
Provide lateral support at bearing points to avoid lateral displacement and rotation

For flat roofs provide proper drainage to prevent ponding

This design is valid until 7/10/2021

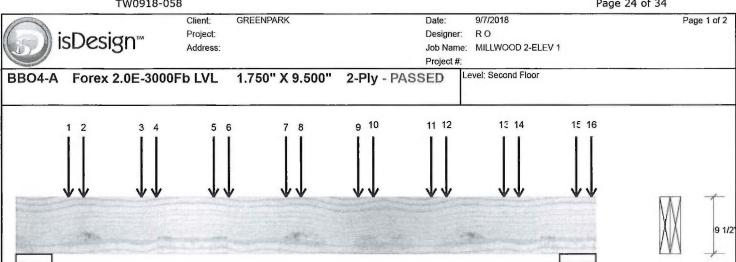
Forex

Manufacturer Info

APA: PR-L318

Forex 2.0E-3000Fb LVL 1.75 X 11.875

2 SPF



Member Inform	nation			Unfacto	red React	ions U	NPATTERNI	ED lb ((Uplift)	
Type:	Girder	Application:	Floor (Residential)	Brg	Live		Dead	Snov	W	Wind
Plies:	2	Design Method:	LSD	1	2221		861		0	0
Moisture Condition:	Dry	Building Code:	NBCC 2010 / OBC 2012	2	2284		885		0	0
Deflection LL:	360	Load Sharing:	No							
Deflection TL:	240	Deck:	Not Checked	1						
Importance:	Normal	Vibration:	Not Checked	1						
General Load										
Floor Live:	40 PSF			Bearings	s and Fac	tored F	Reactions			
Dead:	15 PSF			Bearing	Length	Сар.	React D/L lb	Total	Ld, Case	Ld. Comb.
		1		1-SPF	6.000"	34%	1076 / 3332	4409	L	1.25D+1.5L
				2-SPF	6.000"	35%	1106 / 3425	4531	L	1.25D+1.5L

8'

Analysis Results

1 SPF

Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
Moment	7713 ft-lb	3'11 1/4"	22724 ft-lb	0.339 (34%)	1.25D+1.5L	L
Unbraced	7713 ft-lb	3'11 1/4"	21721 ft-lb	0.355 (36%)	1.25D+1.5L	L
Shear	3886 lb	6'9 1/4"	9277 lb	0.419 (42%)	1.25D+1.5L	L
Perm Defl in.	0.033 (L/2630)	3'11 3/8"	0.238 (L/360)	0.140 (14%)	D	Uniform
LL Defl inch	0.084 (L/1016)	3'11 3/8"	0.238 (L/360)	0.350 (35%)	L	L
TL Defl inch	0.117 (L/733)	3'11 3/8"	0.356 (L/240)	0.330 (33%)	D+L	L

Design Notes

- 1 Performed Secondary Bearing Check (CSA 086-14 6.5.7.3). Assumed point load size: beam width X 4.5.
- 2 Girders are designed to be supported on the bottom edge only.
- 3 Multiple plies must be fastened together as per manufacturer's details.
- 4 Top loads must be supported equally by all plies.
- 5 Top braced at bearings.
- 6 Bottom braced at bearings.

/ Lateral	sienderness ratio based on	full section width.			1.10.000			
ID	Load Type	Location Tri	b Width Side	Dead	Live	Snow	Wind	Comments
1	Point	0-8-12	Тор	111 lb	297 lb	0 lb	0 lb	J7
2	Point	0-11-4	Тор	116 lb	310 lb	0 lb	0 lb	J7
3	Point	1-8-12	Тор	111 lb	297 lb	0 lb	0 lb	J7
4	Point	1-11-4	Тор	116 lb	310 lb	0 lb	0 lb	J7
5	Point	2-8-12	Ton	111 lb	297 lb	0 lb	0 lb	.17

Continued on page 2...

Calciusted Structured Designs is responsible only of the structural edequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the inlended application, and to verify the dimensions and loads.

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or corrosive

chemicals

Handling & Installation

LVI, beams must not be cut or drilled Refer to manufacturer's product information regarding installation requirements, multi-ply fastening details, beam strength values, and code

fastening desires, because approvals
Demaged Beams must not be used
Demaged Seams must not be used
Design assumes top edge is laterally restrained
Provide lateral support at bearing points to avoid
lateral displacement and rotation

For flat roofs provide proper drainage to prevent ponding

This design is v

Manufacturer Info Forex APA: PR-L318

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Kott Lumber Company 14 Anderson Blvd, Onlario Canada K2H7V1 905-642-4400

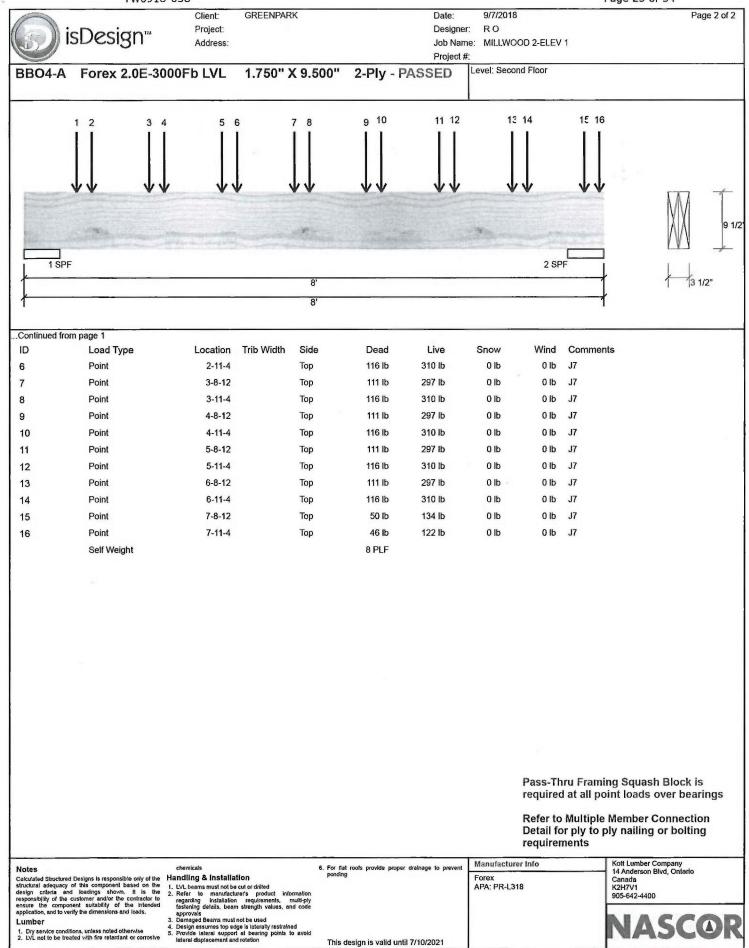








September 13, 2018





GREENPARK Client:

Project: Address: Date:

9/7/2018

Designer: RO

Job Name: MILLWOOD 2-ELEV 1

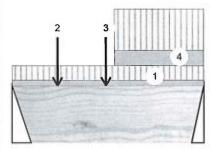
Project #:

Forex 2.0E-3000Fb LVL

1.750" X 11.875"

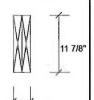
2-Ply - PASSED

Level: Second Floor



1 Hanger (HGUS410) 2 Hanger (HUC410 (Min))

3'3 3/4"



Page 1 of 1

Member Info	rmation		
Type:	Girder	Application:	Floor (Residential)
Plies:	2	Design Method:	LSD
Moisture Condition	on: Dry	Building Code:	NBCC 2010 / OBC 2012
Deflection LL:	360	Load Sharing:	No
Deflection TL:	240	Deck:	Not Checked
Importance:	Normal	Vibration:	Not Checked
General Load			
Floor Live:	40 PSF		
Dead:	15 PSF		

Location Allowed

1'7 1/2" 34261 ft-lb

1'7 1/2" 34261 ft-lb

1'3 1/8" 11596 lb

Capacity

0 999.000 (L/0) 0.000 (0%) 0 999.000 (L/0) 0.000 (0%)

1'7 3/4" 0.145 (L/240) 0.010 (1%) D+L

Comb.

Brg Dead Snow Wind Live 83 0 150 0 0 169 88 0 2

Unfactored Reactions UNPATTERNED lb (Uplift)

2 -Hanger Case 0.007 (1%) 1.25D+1.5L L 0.007 (1%) 1.25D+1.5L L 0.021 (2%) 1.25D+1.5L L

Bearings and Factored Reactions Cap. React D/L lb Bearing Length Total Ld. Case Ld. Comb. 1.25D+1.5L 4.000" 104 / 225 329 L Hanger 2.500" 6% 110 / 253 363 L 1.25D+1.5L

Design Notes

TL Defl inch 0.001

Analysis Results

Actual

246 ft-lb

246 ft-lb

(L/46486)

246 lb

Analysis

Moment

Shear

Unbraced

1 Fill all hanger nailing holes.

Perm Defl in. 0.000 (L/999)

LL Defl inch 0.000 (L/999)

- 2 Girders are designed to be supported on the bottom edge only.
- 3 Multiple plies must be fastened together as per manufacturer's details.
- 4 Top loads must be supported equally by all plies.
- 5 Top braced at bearings.
- 6 Bottom braced at bearings.
- 7 Lateral stenderness ratio based on full section width

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LIDENS	T.L. WISE 100083566
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Sept	ember 13, 201

13, 2018

/ Lateral	sienderness ratio based	on full section width.							
ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Tie-In	0-0-0 to 3-3-12	(Span)1-4-8	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
2	Point	0-9-7		Near Face	26 lb	70 lb	0 lb	0 lb	J2
3	Point	1-7-8		Near Face	33 lb	35 lb	0 lb	PassiTh	nru-Framing Squash Block is d at all point loads over bearings
4	Tie-In	1-9-4 to 3-3-12	(Span)	Тор	15 PSF	40 PSF	0 PSF	0 PSF	at an point loads over bearings
	Self Weight		3-11-13		10 PLF				Multiple Member Connection or ply to ply nailing or bolting nents

L

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and leadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads. Lumber

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or corrosive

Handling & Installation

andfilling & Installation
LVL beams must not be cut or drilled
Refer to manufacturers product information
regarding installation requirements, multi-ply
fastening details, beam strength values, and code
approvals
Damaged Beams must not be used
Design assumes top edge is laterally restrained
Provide lateral support at bearing points to avoid
lateral displacement and rotation

Manufacturer info

APA: PR-L318

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.





GREENPARK Client:

Project: Address:

9/7/2018 Date: Designer: RO

Job Name: MILLWOOD 2-ELEV 1

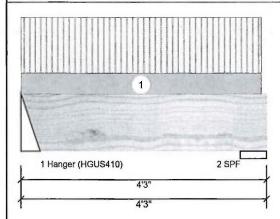
Project #:

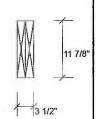
Forex 2.0E-3000Fb LVL

1.750" X 11.875"

2-Ply - PASSED

Level: Second Floor





Page 1 of 1

Member Inf	ormation				,		Unfacto	red React	ions U	INPATTERN	ED lb ((Uplift)	
Туре:	Girder		Application	n: F	loor (Residenti	al)	Brg	Live		Dead	Sno	W	Wind
Plies:	2		Design M	ethod: L	SD		1	35		33		0	0
Moisture Condi	tion: Dry		Building (Code: N	IBCC 2010 / O	BC 2012	2	35		34		0	0
Deflection LL:	360		Load Sha	ring: N	lo								
Deflection TL:	240		Deck:	N	lot Checked								
Importance:	Normal		Vibration:	N	lot Checked								
General Load													
Floor Live:	40 PSF						Bearing	s and Fact	ored	Reactions			
Dead:	15 PSF		1				Bearing	Length	Cap.	React D/L lb	Total	Ld. Case	Ld. Comb.
							1 - Hanger	4.000"	1%	41 / 52	93	L	1.25D+1.5L
Analysis Res	ults						2-SPF	5.500"	1%	43 / 53	95	L	1.25D+1.5L
Analysis	Actual	Location	Allowed	Capacity	Comb.	Case							SE 666
Moment	72 ft-lb	2' 3/4"	34261 ft-lb	0.002 (0%)	1.25D+1.5L	L					/	OFESSIO	NA.
Unbraced	72 ft-lb	2' 3/4"	34261 ft-lb	0.002 (0%)	1.25D+1.5L	L					108	-	101
Shear	36 lb	1'3 1/8"	11596 lb	0.003 (0%)	1.25D+1.5L	L				1	200		151
Perm Defl in.	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)						/	Š 4		m m
LL Defl inch	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)						-	9	T.L. WIS	SE S
TL Defl inch	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)						1	and derive	1000835	000
Design Note]			1	(2)	Run	185/
	er nailing holes. designed to be so	innorted on th	ne bottom edge	only							10	INCE OF	MINI
	s must be fastene			•			1				-		-
	ust be supported		•							5	septe	mper 1.	3, 2018

5 Top braced at bearings.

6 Bottom braced at bearings.

7 Lateral slenderness ratio based on full section width.

ments

ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comm
1	Tie-In	0-0-0 to 4-1-14	(Span)0-10-1	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
	Self Weight				10 PLF				

Pass-Thru Framing Squash Block is required at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Notes

NOtes

Calculated Shuctured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the inlended application, and to verify the dimensions and loads.

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or corrosive

chemicals

Handling & Installation

andling & Installation
LVL beams must not be cut or drifted
Refer to manufacturer's product information
regarding installation requirements, multi-ply
fastening details, beam strength values, and code
approvals
Damaged Beams must not be used
Design assumes top edge is laterally restrained
Provide lateral support at bearing points to avoid
lateral displacement and rotation

For flat roofs provide proper drainage to prevent ponding

This design is

Manufacturer Info

Forex APA: PR-L318

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.







GREENPARK

Project: Address:

Date: 9/7/2018

Designer: RO

Job Name: MILLWOOD 2-ELEV 1

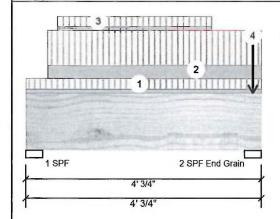
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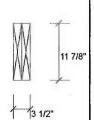
Forex 2.0E-3000Fb LVL F7-B

1.750" X 11.875"

2-Ply - PASSED

Level: Second Floor





Page 1 of 1

Member Infor	mation		
Туре:	Girder	Application:	Floor (Residential)
Plies:	2	Design Method:	LSD
Moisture Conditio	n: Dry	Building Code:	NBCC 2010 / OBC 201
Deflection LL:	360	Load Sharing:	No
Deflection TL:	240	Deck:	Not Checked
Importance:	Normal	Vibration:	Not Checked
General Load			
Floor Live:	40 PSF		
Dead:	15 PSF		

	Brg	Live	Dead	Snow	Wind
	1	643	260	0	0
012	2	885	375	0	0

Unfactored Reactions UNPATTERNED Ib (Uplift)

Analysis Results Analysis Actual Location Allowed Capacity Comb. Case

Bearings and Factored Reactions

Bearing	Length	Cap.	React D/L lb	Total	Ld. Case	Ld. Comb.
1-SPF	3.500"	17%	325 / 965	1289	L	1.25D+1.5L
2 - SPF End Grain	3.500"	20%	469 / 1328	1797	L	1.25D+1.5L

Moment 1215 ft-lb 2' 5/16" 34261 ft-lb 0.035 (4%) 1.25D+1.5L L Unbraced 1215 ft-lb 2' 5/16" 34261 ft-lb 0.035 (4%) 1.25D+1.5L L Shear 2'10 1/8" 11596 lb 0.061 (6%) 1.25D+1.5L L Perm Defl in. 0.001 2' 5/16" 0.120 (L/360) 0.010 (1%) D Uniform (L/34561) 0.003 2' 5/16" 0.120 (L/360) 0.030 (3%) L LL Defl inch L (L/13799) TL Defl inch 0.004 (L/9862) 2' 5/16" 0.180 (L/240) 0.020 (2%) D+L

Design Notes

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- 2 Multiple plies must be fastened together as per manufacturer's details.
- 3 Top loads must be supported equally by all plies.
- 4 Top braced at bearings.
- 5 Bottom braced at bearings.
- 6. Lateral slenderness ratio based on full section width

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September 13, 2018

September 13, 2018

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ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Tie-In	0-0-0 to 4-0-12	(Span)3-7-4	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
2	Part. Uniform	0-4-8 to 4-0-12		Тор	90 PLF	240 PLF	0 PLF	0 PLF	
3	Part, Uniform	0-6-8 to 3-2-8		Near Face	25 PLF	68 PLF	0 PLF	Page-Fhre	u Framing Squash Block is
4	Point	3-11-0		Near Face	88 lb	169 lb	0 lb	required a	at all point loads over bearings
	Self Weight				10 PLF				Multiple Member Connection ply to ply nailing or bolting ents

Notes

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design critieria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the Intended application, and to verify the dimensions and loads.

Lumber

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or co

Handling & Installation

- ATIONING & Installation

 LVL beams must not be cut or drilled
 Refer to manufacturer's product information
 regarding installation requirements, multi-ply
 fastening details, beam strength values, and code
 approvals
 Damaged Beams must not be used
 Design assumes top edge is laterally restrained
 Provide lateral support at bearing points to avoid
 lateral displacement and rotation

For flat roofs provide proper drainage to prevent
ponding

Manufacturer Info Forex APA: PR-L318

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isDesign[™]

Client: GREENPARK

Project:

Address:

Date: 9/7/2018

Designer: RO

Job Name: MILLWOOD 2-ELEV 1

Level: Second Floor

Project #:

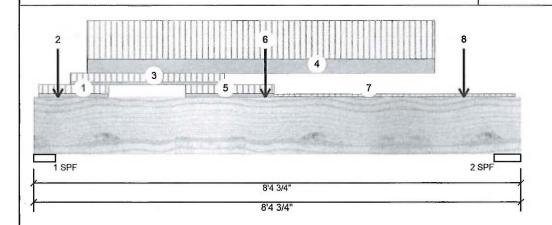
Forex 2.0E-3000Fb LVL

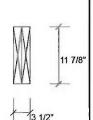
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1.750" X 11.875"

2-Ply - PASSED

2





Wind

0

0

Page 1 of 2

Page 29 of 34

Memb	er In	form	nati	on

Menibel Intolli	141011
Type:	Girder
Plies:	2
Moisture Condition:	Dry
Deflection LL:	360
Deflection TL:	240
Importance:	Normal
General Load	
Floor Live:	40 PSF

15 PSF

Application: Floor (Residential) Design Method: LSD NBCC 2010 / OBC 2012 **Building Code:** Load Sharing: No

Not Checked Not Checked

Unfactored Reactions UNPATTERNED Ib (Uplift) Brg Live Dead Snow 1594 649 0 1

568

Bearings and Factored Reactions

1377

Bearing	Length	Cap.	React D/L lb	Total	Ld. Case	Ld. Comb.	
1 - SPF	4.500"	33%	811 / 2391	3202	L	1.25D+1.5L	
2-SPF	5.500"	23%	710 / 2066	2776	L	1.25D+1.5L	

Analysis Results

Dead:

Analysis	Actual	Location	Allowed	Capacity	Comb.	Case
Moment	5966 ft-lb	4'	34261 ft-lb	0.174 (17%)	1.25D+1.5L	L
Unbraced	5966 ft-lb	4'	31511 ft-lb	0.189 (19%)	1.25D+1.5L	L
Shear	3035 lb	7' 1/8"	11596 lb	0.262 (26%)	1.25D+1.5L	L
Perm Defl in.	0.016 (L/5638)	4' 3/4"	0.256 (L/360)	0.060 (6%)	D	Uniform
LL Defl inch	0.040 (L/2325)	4' 13/16"	0.256 (L/360)	0.150 (15%)	L	L
TL Defl inch	0.056 (L/1646)	4' 13/16"	0.384 (L/240)	0.150 (15%)	D+L	L

Deck:

Vibration:

Design Notes

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- 3 Top loads must be supported equally by all plies.
- 4 Top braced at bearings.
- 5 Bottom braced at bearings.
- 6 Lateral slenderness ratio based on full section width.



September 13, 2018

ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Tie-In	0-1-0 to 1-3-8	(Span)3-7-4	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
2	Point	0-5-0		Near Face	77 lb	205 lb	0 lb	0 lb	J7
3	Part. Uniform	0-7-8 to 3-3-8		Far Face	25 PLF	68 PLF	0 PLF	0 PLF	
4	Part. Uniform	0-11-0 to 6-11-0		Near Face	115 PLF	308 PLF	0 PLF	0 PLF	
5	Tie-In	2-7-8 to 4-1-12	(Span)3-7-4	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
6	Point	4-0-0		Far Face	83 lb	150 lb	0 lb	0 lb	F6

Continued on page 2...

structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended specification and barden and

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or corre

chemicals

Handling & Installation

Indining a installation to drilled
Refer to manufacturer's product information
regarding installation requirements, multi-ply
fastening details, beam strength values, and code

approvals
Damaged Beams must not be used
Design assumes top edge is laterally restrained
Provide lateral support at bearing points to
lateral displacement and rotation

For flat roofs provide proper drainage to prevent ponding

This design is

Manufacturer Info Forex APA: PR-L318

READ ALL NOTES ON THIS PAGE AND ON THE ENGINEERING NOTE PAGE ENP-2. THE NOTE PAGE IS AN INTEGRAL PART OF THIS DRAWING AS IT CONTAINS SPECIFICATIONS AND CRITERIA USED IN THE DESIGN OF THIS COMPONENT.

Kott Lumber Company 14 Anderson Blvd, Ontario Canada K2H7V1 905-642-4400



Version 18.40.162 Powered by iStruct™



GREENPARK Client:

Address:

Project:

9/7/2018 Date: Designer:

RO

Job Name: MILLWOOD 2-ELEV 1

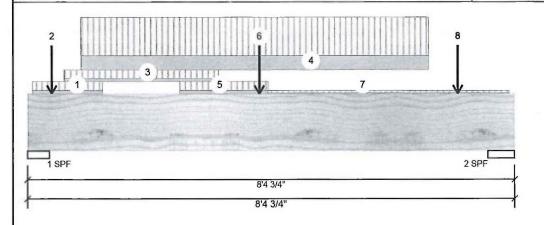
Project #:

Forex 2.0E-3000Fb LVL

1.750" X 11.875"

2-Ply - PASSED

Level: Second Floor



Page 2 of 2

Continued f	rom pa	ge 1
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l	ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
l	7	Tie-In	4-1-12 to 8-3-10	(Span)0-11-3	Тор	15 PSF	40 PSF	0 PSF	0 PSF	
l	8	Point	7-5-0		Near Face	117 lb	313 lb	0 lb	0 lb	J7
1		Self Weight				10 PLF				

Pass-Thru Framing Squash Block is required at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Notes

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads. Lumber

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or corrosive

chemicals

Chemicas
Handling & Installation

1. IVI, beams must not be cut or drilled

2. Refer to manufacturer's product information regarding installation requirements, multi-ply fastering details, beam strength values, and code approvals

3. Damaged Beams must not be used

4. Daction assumes this defails is largefly restrained

Design assumes top edge is laterally restrained Provide lateral support at bearing points to avoid lateral displacement and rotation

For flat roofs provide proper drainage to prevent ponding

This design is valid until 7/10/2021

Forex APA: PR-L318

Manufacturer Info



Project: Address: **GREENPARK**

Date: 9/7/2018

Designer: RO

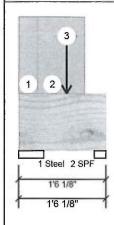
Job Name: MILLWOOD 2-ELEV 2

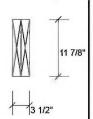
Project #:

Forex 2.0E-3000Fb LVL

1.750" X 11.875"

2-Ply - PASSED Level: Second Floor





Page 1 of 1

Member Info	mation			Unfactored Reactions UNPATTERNED Ib (Uplift)						
Type:	Girder	Application:	Floor (Residential)	Brg	Live	Dead	Snow	Wind		
Plies:	2	Design Method:	LSD	1	72	103	0	0		
Moisture Conditio	n: Dry	Building Code:	NBCC 2010 / OBC 2012	2	61	53	0	0		
Deflection LL:	360	Load Sharing:	No							
Deflection TL:	240	Deck:	Not Checked							
Importance:	Normal	Vibration:	Not Checked							
General Load										
Floor Live:	40 PSF			Bearings a	nd Factor	ed Reactions				
Dead:	15 PSF			Bearing Le	ength	Cap. React D/L lb	Total Ld. Case	Ld. Comb.		
				1 - Steel 5.2	250"	2% 129 / 108	237 L	1.25D+1.5L		
	-			2-SPF 2.3	375"	3% 66 / 92	158 L	1.25D+1.5L		

Analysis Results

	Analysis	Actual	Location	Allowed	Capacity	Comb.	Case	
	Moment	78 ft-lb	10"	33233 ft-lb	0.002 (0%)	1.25D+1.5L	L	
	Unbraced	78 ft-lb	10"	33233 ft-lb	0.002 (0%)	1.25D+1.5L	L	
	Shear	107 lb	1'4 3/8"	11248 lb	0.009 (1%)	0.9D+1.5L	L	
	Perm Defl in.	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)			
	LL Defl inch	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)			
	TL Defl inch	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)			
-								_

Design Notes

- 1 Girders are designed to be supported on the bottom edge only.
- 2 Multiple plies must be fastened together as per manufacturer's details.
- 3 Top loads must be supported equally by all plies.
- 4 Top braced at bearings.
- 5 Bottom braced at bearings.
- 6 Lateral slenderness ratio based on full section width

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T.L. WISE 100083566
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September 13, 2018

O Laterar	sicilideifiess ratio based t	of full section with.							
ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Part. Uniform	0-0-0 to 0-4-0		Тор	80 PLF	0 PLF	0 PLF	0 PLF	Wall Self Weight
2	Part. Uniform	0-4-0 to 1-1-12		Тор	80 PLF	0 PLF	0 PLF	0 PLF	Wall Self Weight
3	Point	0-10-0		Near Face	50 lb	133 lb	0 lb	0 lb	J10
	Self Weight								nru Framing Squash Block is d at all point loads over bearings

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Notes

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads. Lumber

Handling & Installation

andling & Installation
LVL beams must not be cut or drilled
Refer to manufacturer's product information
regarding installation requirements, multi-ply
fastening details, beams strength values, and code
approvals
Damaged Beams must not be used
Design assumes top edge is laterally restrained
Provide lateral support at bearing points to avoid
lateral displacement and rotation

For flat roofs provide proper drainage to prevent ponding

This design

Manufacturer Info Forex APA: PR-L318

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Project: Address:

GREENPARK

Date: 9/7/2018

Designer: RO

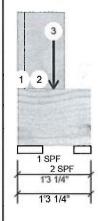
Job Name: MILLWOOD 2-ELEV 3

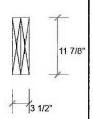
Project #:

Forex 2.0E-3000Fb LVL

1.750" X 11.875"

2-Ply - PASSED Level: Second Floor





Page 1 of 1

Member Infor	mation		Unfactored Reactions UNPATTERNED Ib (Uplift)							
Туре:	Girder	Application:	Floor (Residential)	Brg	Live		Dead	Snov	v	Wind
Plies:	2	Design Method:	LSD	1	108		101	(0	0
Moisture Condition	n: Dry	Building Code:	NBCC 2010 / OBC 2012	2	65		41	(0	0
Deflection LL:	360	Load Sharing:	No							
Deflection TL:	240	Deck:	Not Checked							
Importance:	Normal	Vibration:	Not Checked							
General Load										
Floor Live:	40 PSF			Bearing	s and Fac	tored	Reactions			
Dead:	15 PSF			Bearing	Length	Cap.	React D/L lb	Total	Ld. Case	Ld. Comb.
				1-SPF	5.250"	3%	126 / 162	288	L	1.25D+1.5L
				2-SPF	3.500"	2%	52 / 98	149	L	1.25D+1.5L
1 ' 5 1				1						

Analysis Results

Analysis	Actual	Location	Allowed	Capacity	Comb.	Case	
Moment	58 ft-lb	7 1/2"	34261 ft-lb	0.002 (0%)	1.25D+1.5L	L	
Unbraced	58 ft-lb	7 1/2"	34261 ft-lb	0.002 (0%)	1.25D+1.5L	L	
Shear	190 lb	1'4 3/8"	11596 lb	0.016 (2%)	1.25D+1.5L	L	
Perm Defl in.	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)			
LL Defl inch	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)			
TL Defl inch	0.000 (L/999)	0	999.000 (L/0)	0.000 (0%)			
							_

Design Notes

- 1 Girders are designed to be supported on the bottom edge only.
- 2 Multiple plies must be fastened together as per manufacturer's details.
- 3 Top loads must be supported equally by all plies.
- 4 Top braced at bearings.
- 5 Bottom braced at bearings.



September 13, 2018

6 Lateral	sienderness ratio based d	on full section wigth.							
ID	Load Type	Location	Trib Width	Side	Dead	Live	Snow	Wind	Comments
1	Part. Uniform	0-0-0 to 0-1-8		Тор	80 PLF	0 PLF	0 PLF	0 PLF	Wall Self Weight
2	Part. Uniform	0-1-8 to 0-9-12		Тор	80 PLF	0 PLF	0 PLF	0 PLF	Wall Self Weight
3	Point	0-7-8		Far Face	65 lb	173 lb	0 lb	0 lb	J9
	Self Weight				10 PLF	Pass-Thru Framing Squash Bloo required at all point loads over b			

Refer to Multiple Member Connection Detail for ply to ply nailing or bolting requirements

Calculated Structured Designs is responsible only of the structural adequacy of this component based on the design criteria and loadings shown. It is the responsibility of the customer and/or the contractor to ensure the component suitability of the intended application, and to verify the dimensions and loads. Lumber

Dry service conditions, unless noted otherwise
 LVL not to be treated with fire retardant or corrosive

chemicals

Handling & Installation

LVL beams must not be cut or drilled
Refer to manufacturer's product information
regarding installation requirements, multi-ply
fastening details, beam strength values, and code
approvals

approvals
Damaged Beams must not be used
Design assumes top edge is laterally restrained
Provide lateral support at bearing points to avoid
lateral displacement and rotation

For flat roofs provide proper drainage to prevent ponding

This design

Manufacturer Info Forex APA: PR-L318

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