Covers raking verge using standard purlin overhang options.
Covers up to 750mm overhang using standard verge outriggers.
Covers up to 1200mm overhang using verge outrigger/purlin combination.
OVERHANG OPTIONS

- All gable end loading parameters are based on the edge considerations used in NZS 3604:2011 and cover heavy roof weight, extra high wind load and snow load $S_g$ of up to 1.0kPa.

- All live load considerations as per AS/NZS 1170.

- All timber to be minimum grade SG8 as defined in NZS 3604:2011.

CANTILEVER PURLIN OPTION

![Cantilever Purlin Diagram]

<table>
<thead>
<tr>
<th>Purlin Size &amp; Orientation</th>
<th>Max. Cantilever length (mm)</th>
<th>Purlin Centres (mm)</th>
</tr>
</thead>
<tbody>
<tr>
<td>45x45</td>
<td>200</td>
<td>400</td>
</tr>
<tr>
<td>70x45</td>
<td>300</td>
<td>900</td>
</tr>
<tr>
<td>90x45</td>
<td>450</td>
<td>900</td>
</tr>
</tbody>
</table>

TABLE 1

CANTILEVER OUTRIGGER OPTION

(NOTE: MAXIMUM SIDEWALL OVERHANG OF 750MM - SEE DETAILS ON NEXT PAGE)

<table>
<thead>
<tr>
<th>Purlin Size &amp; Orientation</th>
<th>Max. Cantilever length (mm)</th>
<th>Purlin Centres (mm)</th>
</tr>
</thead>
<tbody>
<tr>
<td>45x45</td>
<td>750</td>
<td>600</td>
</tr>
<tr>
<td></td>
<td>600</td>
<td>900</td>
</tr>
<tr>
<td>70x45</td>
<td>750</td>
<td>900</td>
</tr>
<tr>
<td></td>
<td>600</td>
<td>1200</td>
</tr>
<tr>
<td>90x45</td>
<td>750</td>
<td>400</td>
</tr>
<tr>
<td></td>
<td>600</td>
<td>600</td>
</tr>
</tbody>
</table>

TABLE 2

CANTILEVER OUTRIGGER/PURLIN COMBINATION OPTION

(NOTE: MAXIMUM SIDEWALL OVERHANG OF 1200MM - SEE DETAILS ON LAST PAGE)

<table>
<thead>
<tr>
<th>Purlin Size &amp; Orientation</th>
<th>Max. Cantilever length (mm)</th>
<th>Purlin Centres (mm)</th>
</tr>
</thead>
<tbody>
<tr>
<td>45x45 Purlin, 90x45 Outrigger</td>
<td>1200</td>
<td>450</td>
</tr>
<tr>
<td>70x45 Purlin, 90x45 Outrigger</td>
<td>1200</td>
<td>700</td>
</tr>
<tr>
<td>90x45 Purlin, 90x45 Outrigger</td>
<td>1200</td>
<td>900</td>
</tr>
</tbody>
</table>

TABLE 3
CONSTRUCTION DETAILS FOR CANTILEVER OUTRIGGER OPTION
(SPANS & CENTRES AS PER TABLE 2)

Intermediate block to support purlin where purlin/batten required within overhang section.
Fix each end with 3/ 90mm nails

90x45 back block fixed to truss/rafter overhang and fly rafter with 1/ LUMBERLOK CPC80 fixed with 4/ 14g screws per flange each end

Max. overhang 750mm

Outrigger always located over outside wall top plate

Top dropped gable end truss/rafter
 Fix first fly rafter at each outrigger with 3/ 90mm nails up to outrigger number 4. Fix outer fly rafter to first fly rafter with 90mm nails @ 150mm crs. staggered
Outrigger number 4

90x45 back block fixed to truss/rafter overhang and fly rafter with 1/ LUMBERLOK CPC80 fixed with 4/ 14g screws per flange each end

LUMBERLOK CT200 fully nailed with 30 x 3.15mm or Wire Dog fixing plus 2/ 90mm skew driven nails

LUMBERLOK CT200 fully nailed with 30 x 3.15mm or Wire Dog fixing plus 2/ 90mm skew driven nails

CPC80 to outrigger

LUMBERLOK Strap Nail each side

Minimum 900mm spacing

Top dropped gable end truss/rafter

Outrigger size and centres as Table 2

CANTILEVER length max. 750mm

Dwang to support purlins

3/ 90mm nails (typical)
Standard trusses/rafters

3/ 90mm nails plus 1/ LUMBERLOK Multigrip fully nailed with 30 x 3.15mm nails

Intermediate block to support purlin where purlin/batten required within overhang section.
Fix each end with 3/ 90mm nails

Outrigger

Fly rafter min. 90x45

Top drop on gable end same depth as outrigger

CROSS SECTION

Standard purlins

Standard trusses/rafters

OUTRIGGER

LUMBERLOK Multigrip

Outrigger

Outrigger

3/ 90mm nails

Outrigger

Purlin outline
CONSTRUCTION DETAILS FOR CANTILEVER OUTRIGGER/PURLIN OPTION
(SPANS & CENTRES AS PER TABLE 3)

Fix first fly rafter at each purlin/outrigger with 4/ 90mm nails up to purlin number 4. Fix outer fly rafter to first fly rafter with 90mm nails @ 150mm crs. staggered.

Double standard rafter/truss or special design

Min. 2/ 90mm nails to rafter/truss plus
LUMBERLOK Joist Hanger JH47x90 fully nailed with 30 x 3.15mm

LUMBERLOK CT200 both sides fully nailed with 30 x 3.15mm plus 2/ 90mm skew driven nails

Purlin directly over outrigger. Fix with 90mm nails @ 50mm crs. LUMBERLOK Joist Hanger JH47x90 fully nailed with 30 x 3.15mm

Top dropped gable end truss/rafter

Note: Ceiling Joists as per NZS 3604:2011

Cantilever length 760mm to max. 1200mm

Minimum dimension 1.5 times the cantilever length

90x45 outrigger

Outrigger lined up directly below each purlin. See Table 3 for size and orientation

First outrigger combination to be directly over end wall

3/ 90mm nails plus 1/ LUMBERLOK Multigrip fully nailed with 30 x 3.15mm

LUMBERLOK CPC80 fixed with 4/ 14g screws per flange to back block and truss rafters and fly rafter

90x45 back block

Packer @1000mm crs.

LUMBERLOK Strap Nail each side

Fly rafter to be at least same size as outrigger combinations ie. minimum 140x45

LUMBERLOK CT200 both sides fully nailed with 30 x 3.15mm plus 2/ 90mm skew driven nails

Fix purlins to outrigger with 90mm nails @ 50mm crs.

Top dropped gable end truss/rafter

Double standard rafter/truss or special design

Min. 2/ 90mm nails to rafter/truss plus
LUMBERLOK Joist Hanger JH47x90 fully nailed with 30 x 3.15mm

Max. overhang 1200mm

90x45 dwang

LUMBERLOK Strap Nail each side

Fix first fly rafter at each purlin/outrigger with 4/ 90mm nails up to purlin number 4. Fix outer fly rafter to first fly rafter with 90mm nails @ 150mm crs. staggered

Note: Ceiling Joists as per NZS 3604:2011

CROSS SECTION

LAYOUT