

the **complete** solution







Design-engineered for faster, smoother installation and years of trouble-free performance



Certificate No. 04/4156 The Eurocell Conservatory System





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curtain wallin

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System Guide Issue 2



Eurocell Conservatory Roof System

The **Better** Choice

The Eurocell Conservatory Roof System offers you a unique solution. A top quality conservatory system with many unique features designed to eliminate common problems experienced by both fabricators and installers - at a price point that doesn't penalize you for wanting to fit the best.

Designed from the ground up by Eurocell's experienced product development team, the philosophy behind this system has come from listening to installers and fabricators and finding out what they want from their ideal roof system. Speed and ease of installation and fabrication, coupled with design flexibility were key objectives during the design of the system. This has led to the development of one of the most advanced and user friendly systems on the market, which has met and surpassed the rigorous criteria required for BBA accreditation.

The strengths of the Eurocell Conservatory Roof System are backed up by Eurocell's manufacturing expertise, efficient infrastructure and support network. The company's policy of ongoing capital investment ensures that this system will continue to be a market leader in conservatory design, and help keep you at the forefront of conservatory technology.



The Eurocell Pinnacle

Conservatory System



BS EN ISO 9001:2000 BSI Registered Firm FM 45551 Quality Management System



BS EN ISO 14001 BSI Registered Firm Environmental Management System







Summary Benefits

The Complete Solution

- In house extrusion of all sections means perfect colour match to Eurocell window profiles and Eurocell Building Plastics.
- · Full through-colour cream profiles.
- BBA accredited white and woodgrain from 2.5° 45°

Roof Glazing

- Roof pitches between 2.5* 45* in 24mm glass or 25/32mm polycarbonate.
- Patented ridge end sealing assembly reduces the risk of water ingress and overcomes the need for silicone sealing.
- Incorporates glass retention system as standard on every roof design. Probably the best roof available for glazing in glass.
- The ridge top cap can be fitted and lead work complete before glazing making it quicker and easier for installers to obtain water tight installations.
- Aesthetically designed, maintenance free aluminium ridge cresting and finials.
- Fully foiled ridge top capping for all woodgrain installations

Guttering

 Ogee guttering sits clear in front of eaves beam reducing any risk of overflow leaks.

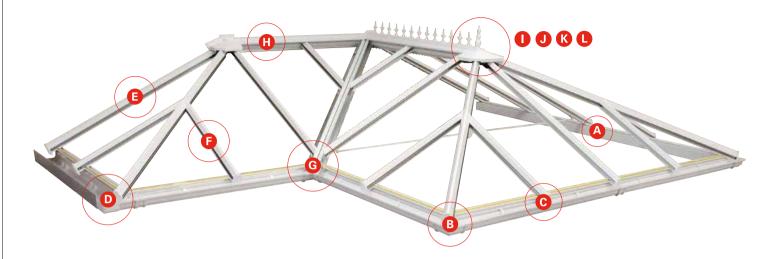
Glazing Bars

- A built in rafter gutter system is supplied as standard for neat and leak free lead flashing back against house walls.
- Jack rafter locations allow four way adjustment on-site to ensure neat connections.
- Simple and neat clip up and over rafter end caps. Great for box gutters or where access is limited.

Box Gutters

- High strength standard box gutters never require additional strapping even for glass.
- Silicone free box gutter adaptors make for easy leak free all weather installation.
- Box gutters are cut square to the external face of the frames below rather than mitred over them minimising any risk of internal leakage.

Eurocell Conservatory Roof System



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Overview

In order to illustrate the main features and benefits of the Eurocell Conservatory Roof System we use this Edwardian P-shaped conservatory with box gutter and hip to take you through the various elements that combine to make this system the ideal choice for today's market.

Colour Options

The Eurocell Conservatory Roof System is available in a range of different colour options including white, mahogany, rosewood, golden oak, mahogany on white, rosewood on white, golden oak on white and cream.

When required the Eurocell Conservatory Roof System can be specified with a complete range of fully foiled components. This includes foil finishes to the external ridge top capping, ridge ends, half ridge capping and valley capping; providing a unique and continuous finish. Aluminium foiled glazing bar top caps are also available.

Colour Fast

Specially formulated resins and stabilizers ensure that our profile will not discolour over time, ensuring hassle free installations and peace of mind.



Mahogany



Rosewood



Golden Oak



Perfectly Colour Matched

Eurocell mixes its own PVC-u compound which is used across our entire range of products, so whichever finish and colour options you choose you can be assured that if you also install either Eurocell windows, doors or roofline products they will match perfectly.

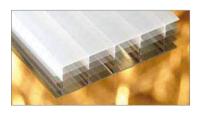
Glazing Options

The Eurocell Conservatory Roof System is designed to accommodate a wide range of different glazing. 25mm or 32mm polycarbonate and 24mm sealed glass units can all be specified in various finishes (see page 24 for glazing information).

Designed to Last

Designed and manufactured to stand the test of time. The Eurocell Conservatory Roof System's BBA accreditation guarantees a life expectancy of at least 25 years for white and foiled finishes for pitches as low as 2.5' and as high as 45w.







Certificate No. 04/4156
The Eurocell Pinnacle Conservatory System

Eaves Beam & Gutter

Glazing pitches between 2.5° and 45° can be achieved from the box section aluminium eaves beam, which has been designed to provide maximum strength and thermal efficiency. The external front edge of the eaves beam is thermally clad in PVC-u, onto which gutter brackets are attached, which simply twist into place. These concealed brackets support a clip fit dry joint gutter system which sits far enough forward to avoid any need for special running outlets and overcomes any risk of overflow leakage finding its way inside the conservatory.



Fixed 25° angle box section eaves beam



Variable angle 2.5° - 45° box section eaves beam



New Sculptured Eaves

The new sculptured range includes eaves, corners and internal ridge under cladding. Designed for greater consumer appeal, it's sure to be a hit with your customers.



Rafter Fixing & End Detail

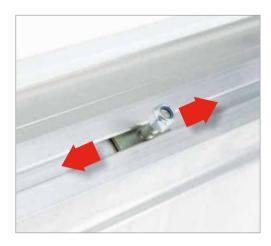
Easy slide single and double fixing studs are used to bolt rafters into position. They allow for easy movement and adjustment of the rafter bar before final positioning and fixing takes place. Simple and neat clip 'up and over' rafter end caps incorporate and conceal high strength glazing end stops on the bottom of each bar.



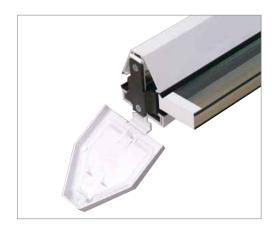
Glass Roof Suitability

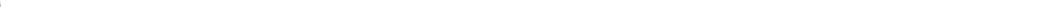
Suitability for glass roof glazing is a major feature for the Eurocell roof. Each glazing bar is supplied as standard with concealed high strength glass end stops. This provides a safe buffer platform for units to rest against to overcome any risk of slippage while the wide flat base of the eaves beam seal minimises any 'roll out' weakness between the bars.

In addition the minimal reliance on silicone sealing around either the eaves or ridge highlights the attention to detail that has gone into every aspect of the roof design. Together this makes the Eurocell roof particularly suitable for conservatory roof glass, such as Perfect Day (see page 21 for details).











Silicone free box gutter adaptors



Box gutter under cladding and insulation

Baised Back Box Gutter

Included within the box gutter range are special dedicated raised back attachment and extension sections that utilise the same variable support section as used around the eaves beam. This provides full pitch flexibility and allows the same sealing method and system to be used. The result speeds site installation and ensures a neat final clad finish



Box Gutters

Wide box gutter design provides space and access for fitting and maintenance. Cutting the box gutter to the external frame dimensions avoids any need to mitre across and over the top of window frames. minimising any risk of water ingress.

Strength is also one of the design features of the box gutter system. Combining it with the eaves beam section overcomes any need for additional strapping. Also in situations where the box gutter requires on site jointing, running the eaves beam across the join locks the sections together to help minimise movement and risk to the seal joint.

Silicone free box gutter adaptors can be installed in all weathers by simply clip fitting the metal brace strap into position. This minimises the reliance on the installer and overcomes any need for heat guns, drying, or taping onsite. All box gutters are supplied with foam insulation to minimise the build up of condensation within the conservatory.



A selection of box gutter adaptors, which cover nearly every conceivable conservatory design including a box gutter fixing brace.





The dry joint adapter simply slides into place before being retained by a clip fit steel brace. This results in a leak-proof all weather installation solution, which is silicone free.

How It Works

A unique feature of the Eurocell roof are the

leak-free and silicone-free box gutter adapters.

This is achieved by running the eaves beam

along the inside face of the box gutter. This

allows the eaves beam to be mitre cut at corners without requiring any cutting to the

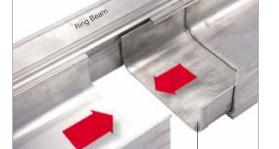
box gutter, which can then be cut flush to the

outside frame. This means any water can only

drain away to the outside of the conservatory.







Sliding Insert

Joining Box Gutters

Occasionally for either transport or access reasons it is necessary to cut box gutters. Such box gutters then need to be mechanically rejoined on site. In these cases, a factory welded insert simply slides into the adjoining section before sealing. The insert helps keep box gutters together during installation and once installed minimises any movement to maintain a watertight join. The ring beam then runs across the join to help lock each side of the box gutter together and minimise any subsequent movement.



Rafter Bars

A purpose designed range of bars which can accept 25mm and 32mm polycarbonate or 24mm glass sealed units. All such bars are supplied with glazing stops which are concealed behind special clip up and over end caps. For greater spans bars can be supplied with concealed steel reinforcement after which a range of bolster bars (with dedicated end caps) is available which can be fitted to the underside of the bar.



Bolster Bar

New Aluminium Top Cap Option

The aluminium top cap provides the ideal solution when you want to offer your customers an alternative premium product.

Gable Rafter Bars

All conservatory designs that include wall mounted gable rafters are supplied with an integral gutter channel as standard for neat and effective lead flashing.



Gable rafter with integral gutter system



Victorian hip bar in Rosewood





Lightweight rafter bar



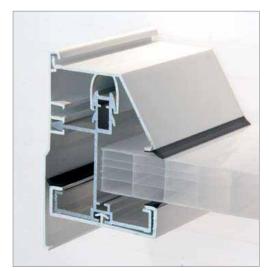
Edwardian hip bar in Golden Oak



Victorian hip bar with aluminium top cap incorporating a PVC thermal break



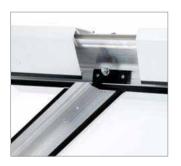
Rafter bar with central steel insert in colour-through Cream



Gable rafter incorporating gable cloaking trim

Jack Rafters

Low line easy fit jack rafters require no notching. The jack rafter assembly slides down the central chamber of the rafter bar to ensure a strong and secure fixing. Moveable fixing blocks link the hip bar to the jack rafter assembly. This simple design provides flexibility enabling 4-way on-site adjustment if necessary.

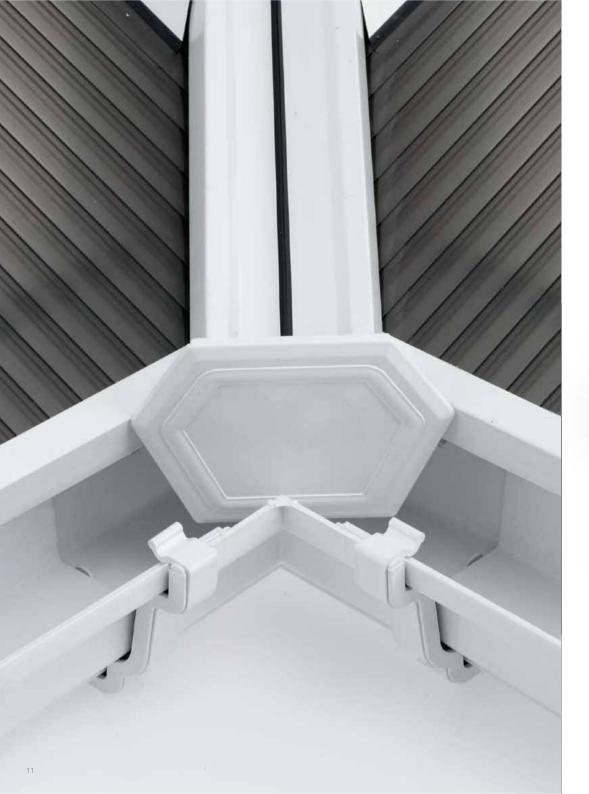




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Dedicated 'L' shaped ridge cover cap is available for neat finishing and sealing

Valleys

The variable angle valley gutter system provides secure and watertight installations for both glass and polycarbonate glazing and is able to accommodate a wide range of different pitch combinations. It also incorporates a glass retention system.

Lean-to Wall Plates

The lean-to wall plate is a cost effective solution for mono pitch gable end lean-to conservatories.

This system is suitable for pitches between 2.5' and 15'. The neat top cap detail makes for easy lead flashing and sealing.



Half Ridge Wallplates

The half ridge wall plate is used in combination, P-shaped and hipped lean-to conservatory designs. A half spider bracket, spider mouldings and half ridge bung assembly are available to ensure the same reliable, weather tight seal as achieved with full ridges. Suitable for pitches between 15° and 45° using either polycarbonate or glass. When woodgrain finishes are required, all caps and under claddings are supplied fully foiled.



Deep Skirt Top Cap

To ensure a neat and water tight finish to hip ended roof designs with pitch variance from one side of the hip to the other, a deep skirt half top cap is available. This allows the top cap to be cut to sit level, on top of the glazing, on either side of the hip.



Ridges

A fixed 25° or variable angle ridge body is available to accept roof pitches between 15° and 45°. Both designs accommodate 25mm and 32mm polycarbonate or 24mm glass units. Ridge top caps are supplied fully foiled whenever woodgrain finishes are required.

The ridge top capping can be fitted prior to final glazing, making for easy on site access for sealing and lead flashing work. Suitable ridge to wall flashing trims are also supplied as standard. Combined finial and crestings slide along a captive rail overcoming the need for fixings to pierce through the external ridge top capping, reducing the risk of water ingress.

Eurocell ridges are virtually silicone free because the ridge has been designed to minimise the reliance on the fitter to obtain a water tight seal, making this roof one of the quickest and easiest to install.



Variable Angle Ridge (15° - 45°)



Fixed Angle Ridge - 25° (showing cream cappings and flashing trim)



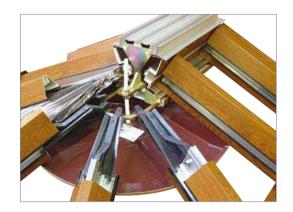
Internal decorative ridge under cladding



Ridge Radius End Assembly

Designed to eliminate the need for silicone sealing around the end of the rafter and hip bars, Eurocell's patented ridge radius end assembly provides a watertight seal that you can trust. This is achieved by bolting a secondary sealing assembly down on top and in front of the glazing panels. A continuous closed cell foam seal surrounds this, which the rafter caps butt up to. This prevents any risk of rainwater or leaves penetrating back inside the ridge end, without the installers having to rely on any silicone for sealing.





Bottom Caps

As part of the Eurocell Conservatory Roof System philosophy of making the installers and fabricators life as easy as possible, bottom caps are produced in 3 different pitch variants. This means that when installing or fabricating a standard 25' pitch conservatory no cutting of the bottom cap is required.



Spider Bars

Spider end mouldings allow all of the glazing bars fitted onto the front of the ridge to be square cut. These are factory fitted and slide into the end of the rafter bars ready to be hooked over the spider bar bracket, before final tightening of the grub screw. This method of construction is quick, easy and reliable. To ensure optimum weather performance a patented foam ridge end cover is also provided to minimise any reliance on silicone sealing.





MOOD Speaker System

At last, a conservatory innovation that end users really care about! MOOD is a fully integrated conservatory speaker system, enabling people to enjoy music in their new room with no trailing wires or bulky speakers. A further option available is to include low voltage LED lights within the decorative cornices.

One of the great advantages of the Eurocell MOOD system is that all the wiring is hidden, helping to make your conservatory a clutter free environment. When you have your new MOOD system installed all you will see is the connection point on your wall and your funky new speakers which seamlessly blend into the conservatory. All of the work is done in the background with the wiring integrated into the conservatory's structure, completely out of sight and protected. You will never trip over a trailing cable again!







- 15/30 Watts Power Handling
- 110 16000 Hz Frequency Range
- 8 Ohms Impedance
- Speakers are available in 90°, 135° or 150° angles to fit any conservatory roof perfectly

Player Requirements

The MOOD speaker system works with any player or amplifier which has a standard speaker cable output.











Roof vents are available with either manual or electric opening mechanisms. These can be specified and supplied factory glazed to minimise the risk and reliance of on-site sealing.



Where additional box gutter support is required for particular conservatory roof designs structurally tested gallows brackets are available in either white, brown or caramel.





For gable fronted designs, particularly those using French doors under the gable, the option exists of continuing the eaves beam and guttering across the gable end. This arrangement may also reduce the number of downpipes and soakaways required. The eaves beam will also allow the weight of the overhead gable assembly to be distributed more evenly.



Gable with eaves beam and gutter section

When no guttering is required across a front gable, a dedicated reinforcement beam is available to offer structural support and minimise flex and movement. This improves sightlines.



Gable fronted design with front structural support beam



No gutter - gable structural support beam













Attractive finials and crestings options are available in either aluminium or PVC-u.



Cream Conservatory

The introduction of a true through-colour cream range enables you to order conservatories with the same lead time and same confidence as with white orders. Fully colour matched to Eurocell's range of windows, doors, roofline and trims, cream is a great way of differentiating yourself from your competition without any of the usual lead time or colour matching hassle.





Perfect Day glass provides added comfort to maximise conservatory enjoyment throughout the whole year. Its revolutionary dual action self clean coating lasts the lifetime of the glass and is activated by sunlight and rain. Also incorporating Solar Control, which reduces heat build up without costly air conditioning. There are six options available for maximum versatility and choice. These are available in either Pilkington Activ Blue or Neutral coloured glass. See table below for glass







Glass Type	Colour	Cool in Summer	Warm in Winter	Permanent Self Clean	U Value W/m2K	Solar Resistance	Light Transmission
Perfect Day Super	Blue	✓	1	✓	1.2	63%	51%
	Neutral	/	1	/	1.2	63%	51%
Perfect Day Thermal	Blue	√	1		1.2	59%	56%
	Neutral	✓	1		1.1	53%	58%
Perfect Day Clean	Blue	✓		✓	2.6	55%	53%
	Neutral	1		1	2.6	55%	53%

Each of these six options can be upgraded to include Warm Edge Spacer Bar (which improves the thermal performance of the overall unit and helps minimise condensation forming around the outside of the unit).

U Value - is a measure of thermal efficiency; the lower the figure, the more thermally efficient.

Solar Resistance - is a measure of resistance to the energy of the sun; the higher the figure, the greater the resistance to solar heat gain.

Light Transmission - is a measure of the amount of light passing through the glass; the higher the figure, the more light is transmitted.

Privacy - The reflective properties of Perfect Day Clean Neutral offers increased levels of privacy, as it has a mirror glass appearance.



Roof Height Calculator



Roof Height Chart Apex Roof Designs With Ridges

	Width						
Pitch	2500	3000	3500	4000	4500	5000	5500
15°	588	655	722	789	856	923	990
20°	708	799	890	981	1072	1163	1254
25°	836	953	1069	1186	1302	1419	1535
30°	975	1119	1263	1408	1552	1696	1841
35°	1128	1303	1478	1653	1828	2003	2178

Height to bottom of ridge = less 173mm

For height including cresting allow a maximum of 170mm



Half Ridge Wallplate Height Chart Hip Ended Designs

	Projection						
Pitch	2000	2250	2500	2750	3000	3250	3500
15°	789	856	923	990	1057	1124	1191
20°	981	1072	1163	1254	1345	1436	1527
25°	1186	1302	1419	1535	1652	1769	1885
30°	1408	1552	1696	1841	1985	2129	2274
35°	1653	1828	2003	2178	2354	2529	2704
40°	1931	1968	2351	2560	2770	2980	3190

Height to bottom of wallplate = less 173mm



Lean-to Wallplate Height Chart Mono Pitch Designs

	Projection				
Pitch	2000	2500	3000	3500	4000
2.5°	360	382	403	425	447
5°	447	491	535	578	622
7.5°	535	601	667	733	799
10°	624	712	801	889	977
12.5°	715	826	936	1047	1158
15°	807	941	1075	1209	1343

Height to bottom of wallplate = less 192mm

Glazing Technical Data

Glazing Options		U value ¹ W/m2K	% Light Transmission
Perfect Day Conservatory Roof	Perfect Day Super Blue	1.2	51%
Glass 24mm Glass (4/16/4)	Perfect Day Super Neutral	1.2	51%
	Perfect Day Thermal Blue	1.2	56%
	Perfect Day Thermal Neutral	1.1	58%
	Perfect Day Clean Blue	2.6	53%
	Perfect Day Clean Neutral	2.6	53%
Polycarbonate 32mm Seven Wall	Clear	1.4	59%
	Opal	1.4	11%
	Bronze	1.4	13%
	Bronze/Opal	1.4	15%
	Solar Control	1.4	7%
Polycarbonate 25mm Five Wall	Clear	1.7	62%
	Opal	1.7	14%
	Bronze	1.7	17%
	Bronze/Opal	1.7	17%
	Solar Control	1.7	7%
Typical Standard Toughened	Clear	2.7	81%
24mm Glass (4/16/4)			

The values shown above are provided for guide purposes only, and are subject to variation caused by seasonal changes and other factors.

¹ **U Value** is a measure of thermal efficiency; the lower the figure the more thermally efficient.

(Note - The above information is for guidance purposes only and Eurocell cannot accept responsibility for the way in which it is used or interpreted. As part of our ongoing policy of continuous development, Eurocell reserves the right to change and amend product details and specifications without prior notice.)



Conservatory Marketing Support



Eurocell Conservatory Roof System Guide PS GUIDE 28 pages



Pinnacle system overview
PSOVERVIEW
6 pages



Conservatory Roof
Price Matrix
CON2
16 page



Conservatory Brochure
CON6
24 pages



Pinnacle Conservatory BBA Sheet 1

PBBA1

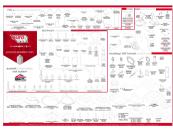
4 page



Pinnacle Conservatory BBA Sheet 2
PBBA2
4 page



CONSP
set of 7 A2 posters



Conservatory Component Poster
CONWCA1 = A1
CONWCA3 = A3



Small Conservatory Sample Box OOBP062 450 x 350mm

All of the above items can be ordered with the Eurocell Sales Office. Please call our sales team direct on **01773 842222** to place your order.



The Guide

This guide is intended to give a brief overview of the main design features and benefits of the Eurocell Conservatory Roof System. The system is constantly expanding and evolving due to market needs and Eurocell's commitment to delivering the best solutions for its customers.

In order to view the latest system developments please visit www.eurocell.co.uk

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