

Whole-system Design

Learn about Whole-system Design: what it is, how to set it up, and what it can do for your solar PV system design workflow.

- [Whole-system Design](#)

Whole-system Design

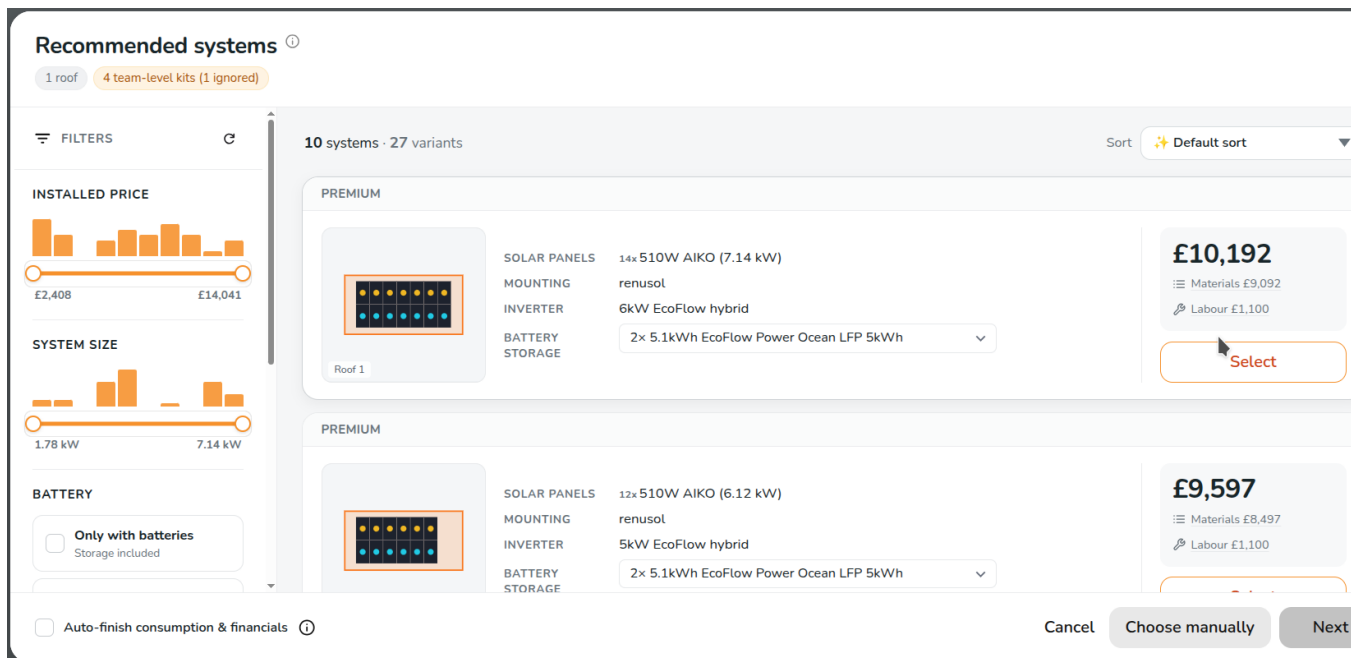
easy-pv.co.uk

Whole-system design suggests complete solar systems for a project -panels, mounting, inverter and battery -worked out, costed and ready to apply. Instead of completing the panel, inverter, consumption and financial tasks by hand, you pick a system from a shortlist and Easy PV fills the project in for you.

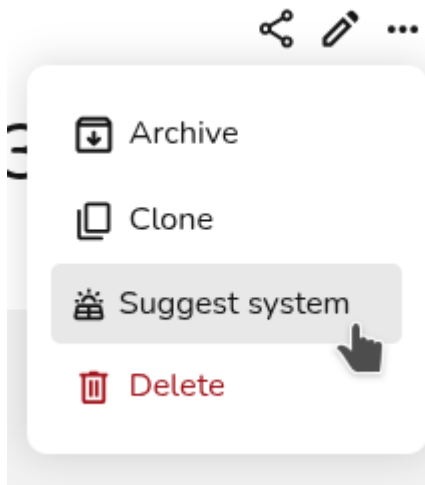
Viewing the Whole-system Design kit suggestions

There are two ways to view the kit suggestions generated by the Whole-system Design (WSD) feature.

1. **Automatically.** Create a project and draw or import your roofs. Once there's roof data, the **Recommended systems** window opens on its own - for example when you finish the roof task and click Next.



2. **Whenever you want them.** On the project overview, open the three-dots menu and choose **Suggest system**. This is always available on a solar project, even if you've turned the automatic suggestions off.

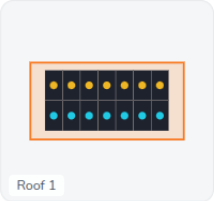


If you don't see either, jump to [Why am I not getting any suggestions?](#)

Choosing a system

Choosing a system couldn't be easier. Each card shows you:

PREMIUM



SOLAR PANELS

14x 510W AIKO (7.14 kW)

MOUNTING

renusol

INVERTER

6kW EcoFlow hybrid

BATTERY STORAGE

2x 5.1kWh EcoFlow Power Ocean LFP 5kWh

£10,192

Materials £9,092

Labour £1,100

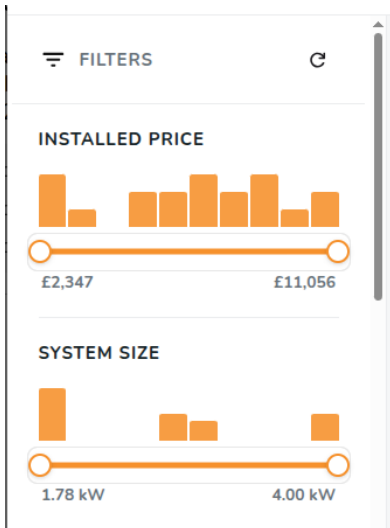
Select

- install size and panel count
- the inverter, and the battery if there is one
- **Materials** - the equipment cost. Click it to see every priced line that makes up the total
- **Installed** - the total installed price

Filtering your options

Open **Filters** to limit the list by:

- **Price and Install size** - drag orange the sliders to adjust the price range



- **Battery storage** - all systems, only with storage, or only without

BATTERY

☐ **Only with batteries**
Storage included

☐ **Only without batteries**
Inverter only

- **Kit combinations** - tick the kits you want to see systems from

COMBINATIONS 7

Site kit combinations ☒

☒ AIKO & Fox ESS

☒ AIKO & SigEnergy

☒ Trina & Fox ESS

☒ Eurener & Fox ESS

☒ Trina & Fox ESS (string)

Kit combinations that couldn't produce a system for this project are shown greyed out, with the reason underneath - usually that a part is out of stock or has no price.

Sort defaults to **Magic Sort**, which mixes strong all-rounders, higher-output systems and cheaper options so the top of the list gives you a spread rather than five variations of the same thing. You can switch to a standard sorting option - **price, install size, panel quantity** or **battery storage, ascending** or **descending** - at any time.

4 systems · 13 variants

Sort Default sort

EURENER & FOX ESS

SOLAR PANELS 6x 500W Eurenere (3 kW)
MOUNTING fastensol
INVERTER 3kW Fox ESS hybrid
BATTERY STORAGE 2.9kWh Fox ESS EQ2900-M 2.88kWh Li-ion - Master, 2.9kWh Fox ESS EQ2900

AIKO & FOX ESS

SOLAR PANELS 6x 465W AIKO (2.79 kW)
MOUNTING fastensol
INVERTER 3kW Fox ESS hybrid
BATTERY STORAGE 2.9kWh Fox ESS EQ2900-M 2.88kWh Li-ion - Master, 2.9kWh Fox ESS EQ2900

£4,085
Materials £4,085

Select

Price (low to high)
Price (high to low)
Panel quantity (low to high)
Panel quantity (high to low)
Install size (low to high)
Install size (high to low)
Battery storage (low to high)
Battery storage (high to low)

Swapping parts without starting again

Where a suggestion comes in more than one configuration, the **Inverter** and **Battery** lines on the card become drop downs. Change either one and the card switches to that version, keeping the rest of the system as close to what you were looking at as possible.

AIKO & SIGENERGY

SOLAR PANELS 4x 465W AIKO (1.86 kW)
MOUNTING fastensol
INVERTER 3.7kW Sigenergy hybrid
BATTERY STORAGE 8.8kWh Sigenergy 8.76kWh Battery

Checking the Financial assumptions

The financial estimates are priced against an import tariff, an export rate, and an annual consumption figure. The **assumptions** chip in the window tells you which figures are being used, flags any that are missing, and lets you change them there and then. The estimates re-price against whatever you set.

Click **Edit** to open the **Consumption** task and change the assumptions.

The **assumptions** chip

Auto-finish consumption & financials ⓘ

35.34p import 28.68p export 3,900 kWh/yr

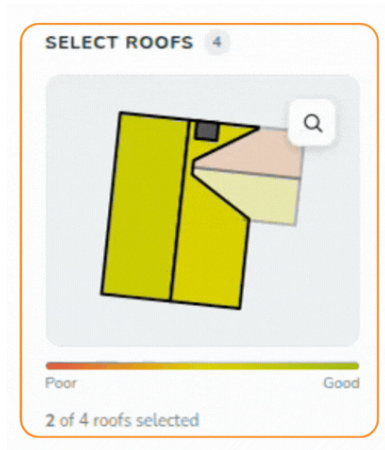
Edit

Cancel Choose manually Next

Systems with a **Smug**-compatible inverter are badged. If you're set up for **Smug** battery optimisation and the project is on a time-of-use tariff, the estimates account for it.

Choosing which roofs to use

By default, suggestions are built for the **three best-rated** roofs on the project. To change that, use **Select roofs** (or **Choose different roofs**).



By default, suggestions are built for the three best-rated roofs on the project. To change that, use Select roofs (or Choose different roofs).

- On **3D** and **magic-mode** projects you get a small bird's-eye view of the building. Tap a roof to include or exclude it.
 - Roofs are shaded by how much they'd generate, and there's a magnifier for tight spots.
- On **quick-roof** and **roof-outline** projects you get a simple list of tick boxes.

Confirm your choice and the estimates regenerate for just those roofs.

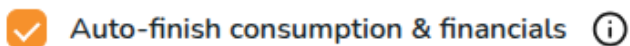
Applying a system

Select a card and click the **Next** button at the bottom. Easy PV then:

1. applies the panels, mounting, inverter and battery to the project, and
2. takes you to the project overview with the system in place.

From there it's an ordinary project. Every task is still yours to open and change -swap the inverter, restring the array, adjust the mounting, whatever you need.

Auto-finish consumption & financials



Select **Auto-finish consumption & financials** in the bottom left of the window and Easy PV also completes the **Performance**, **Consumption** and **Financial** tasks in the background, using standard assumptions, so the project is ready for the customer proposal without you touching them.

Stay on the overview while it finishes - if you navigate away mid-way it stops, and those tasks stay for you to complete yourself.

Un-tick it and only the equipment is applied - **Consumption** and **Financial** tasks are yours to fill in separately.

Where the suggestions come from

Every suggestion is built from a **kit combination**: a panel, a mounting system per roof type, an inverter group, and optionally batteries and optimisers. Nothing outside your kit combinations is ever suggested.

Free accounts use the kit combinations set at site level, which we put together and keep up to date. You can't edit these, but you don't have to set anything up either.

Pro accounts:

These use their team's own kit combinations. Your admins build them under **Kit combinations**, found in **Pro Account Settings > Design**.

For Pro admins: the quality of the suggestions is the quality of your kit combinations. Cover the full range of jobs you do, from small domestic through to your larger commercial installs, and keep them current as your buying changes. A team with two kits gets two flavours of suggestion; a team with a well-spread set gets a comprehensive shortlist.

Turning it on and off

There are two relevant settings for turning the Whole-system Design suggestions on and off. These are found in slightly different places depending on whether you have a free or **Pro** account. Either

way, they only appear once there's at least one kit combination available to you.

Suggest a whole-system design when creating a project controls whether the Recommended systems window opens on its own, and Auto-finish consumption & financials by default sets how that tick box starts out in the window.

On a free account

Everything is in one place: **My Account > Preferences > Design.**

Whole-system design

When creating a new project, suggest a complete system (panels, inverter and battery) based on your kit combinations. [Learn more](#)

- ☒ Suggest a whole-system design when creating a project
- ☒ Auto-finish consumption & financials by default

Suggest a whole-system design when creating a project: De-select this and the window stops opening by itself. The three-dots **Suggest system** option stays, so you can still ask for suggestions whenever you want them.

Auto-finish consumption & financials by default: Sets how the tick box in the window starts out. You can always (de-)select it for a single project.

Free accounts can't edit the kit combinations your suggestions are built from. Those are the ones we maintain at site level - so these two switches are the full extent of what's configurable on a free account. If you want suggestions built from your own equipment and prices, consider upgrading to **Pro**.

On a Pro account

Pro has the same two settings, at two levels.

Your own settings: **My Account > Preferences > Design**

These settings determine how **Whole-system Design** applies to your personal Easy PV account. Every **Pro** user has these, admin or not.

Your team's settings: **Pro Account Settings > Design (team admins only)**

The same two settings, applied to everyone in the team. Use these to set how **Whole-system Design** behaves across the team by default, **then individual installers can adjust their own as above.**

Pro admins also control the input the suggestions are built from, under **Kit combinations** in the same **Design** section. That's the setting that actually determines the kit combinations themselves: the two switches above only decide when the window appears.

Site-wide settings (site administrators)

If you administer a whole Easy PV site, there's one more level at **Site Settings > Whole-system design**:

- **Availability** - who on the site gets **Whole-system Design** at all:
 - **Off for everyone** - nobody on the site sees it.
 - **Invite people to try it** - installers are asked once whether they'd like to take part, and can opt out again later. Only those who accept see it. Useful for trialling it with willing teams before switching it on across the board.
 - **On for everyone** - everyone sees it, unless their team or they themselves have switched it off.
- **Defaults** - set the default for the **auto-finish Consumption and Financials** tasks here.

While a site is set to **Invite people to try it**, teams and individual installers get an extra **Take part in the whole-system design trial** switch in their own **Design** settings, so they can join or leave without waiting to be asked again.

Which setting wins

For the window opening automatically: any "off" wins.

If the site, the team or the installer has switched it off, the window won't open by itself. That's deliberate - a team admin can't force it onto someone who's turned it off for themselves, and an installer can't turn it back on if their admin has switched it off for the team.

On a free account this only ever comes down to your own switch, unless we've turned the feature off site-wide.

The manual three-dots **Suggest system** option is unaffected by all of this. As long as the project is solar and there's a usable kit combination, you can always ask for suggestions.

For auto-finish: the most specific setting wins.

Your own setting beats your team's, which beats the site's, and a single project can override all three. It's only ever a default - whatever it's set to, you can change the tick box in the window every time.

Whole-system Design: FAQs

❑ Why am I not getting any suggestions?

- There may be no roof data yet. Return to the **Buildings** task, re-draw or scan the roofs first and retry.
- It's switched off somewhere: check **My Account > Preferences > Design**, then your team's Design settings. If you are part of a Pro team, contact your admin.
- Your site settings are on *Invite people to try it* and you declined previously. You can join from the same **Preferences** page.

❑ 'Suggest System' isn't showing in the three-dots menu

- Your site settings are on *Invite people to try it* and you declined previously. You can join from the **My Account > Preferences** page.

❑ The window opens but there are no systems in it.

- No kit combinations enabled for Easy PV. A kit combination has to be enabled and available to Easy PV to be used here. **Pro admins:** check them under **Pro Account Settings > Design > Kit combinations**.
- Parts with no price, or out of stock. Kits are skipped when a panel, inverter or battery has no price or no available stock. Greyed-out kits in the filter list tell you which and why.
- Nothing fits the roofs. With very small or awkward roofs, no kit in your set may produce a workable system. Try including more roofs.
- A pricing warning at the top of the window. If your team prices from a lookup table that can't price these systems, you'll see a warning above the cards. That needs fixing in your pricing settings before suggestions can be costed.

❑ The figures on a card don't match the project after I apply it.

- Suggestions are generated against your team or account's default tariffs and financial settings. If the project carries its own tariff, the applied project re-prices against that, so some figures will shift.
 - Use the **assumptions chip** before you apply if you want the estimates to reflect a specific tariff.

Good to know

- Suggestions never change a project on their own. Nothing is applied until you click **Use system**.
- Applying a system replaces the equipment currently on the project, so if you've already done the panel and inverter tasks by hand, that work is overwritten. Nothing else about the project is touched.
- You can reopen the suggestions and apply a different system as many times as you like.

Still Need Help? / Want to know more?

- **Live training:** [Book onto a live demo session](#) to see this feature in action
- **Contact Support:** If you've got further questions, get in touch with our support team at **help@easy-pv.co.uk** (UK) or **help@easy-pv.ie** (IE). *If you are experiencing a bug, to help us look into your issue faster, please include the email address of your account, the name of the project and screenshots of any unexpected behaviour.*