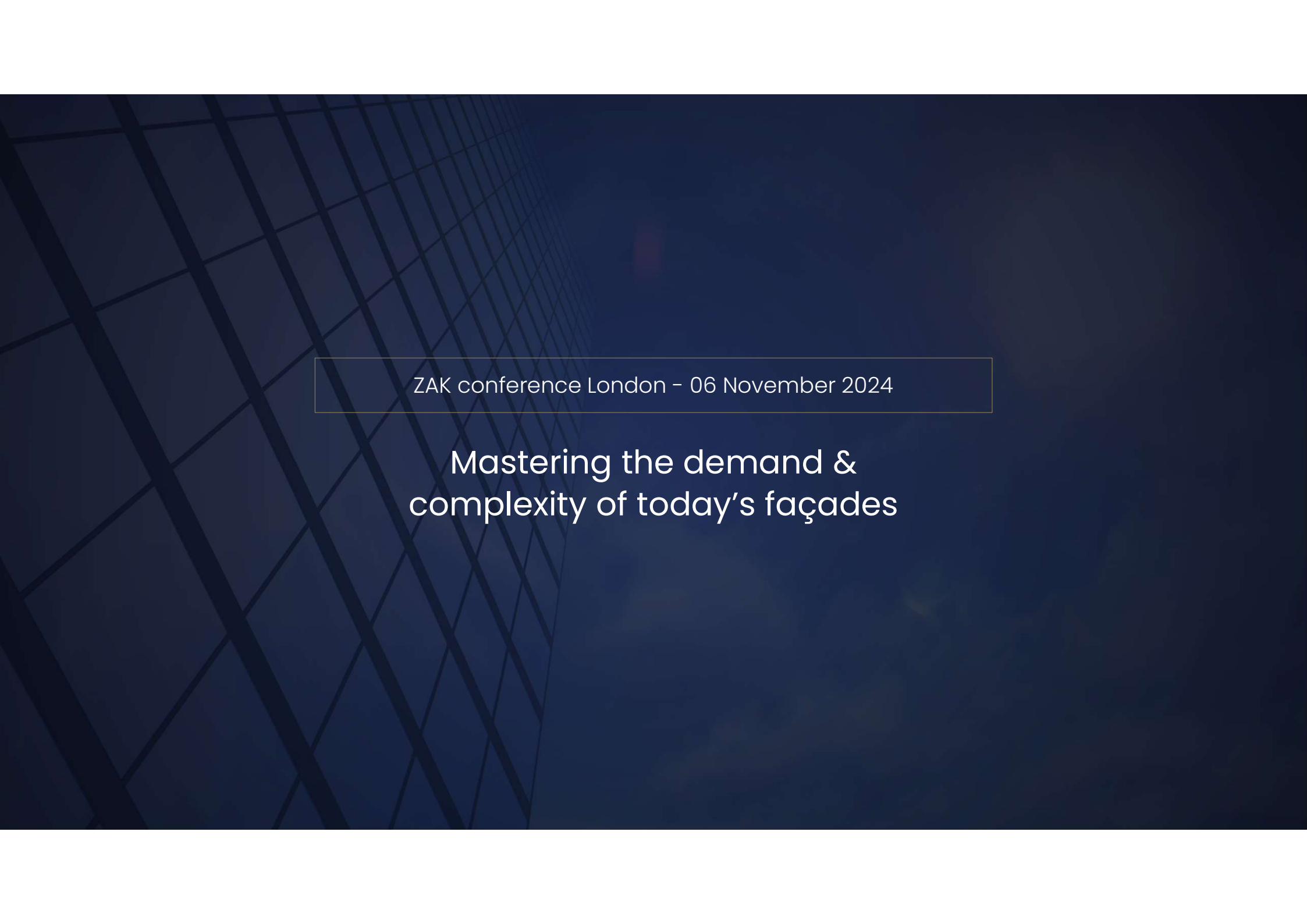




ZAK conference London – 06 November 2024

Mastering the demand & complexity of today's façades

A white bird, possibly a dove, stands prominently in the center of the frame, facing left. It is surrounded by a dense crowd of dark-colored birds, likely pigeons, which are mostly out of focus. The background is a dark, textured mass of these birds, creating a strong contrast with the white bird.

Hybrid steel
curtain walls,
the long-awaited
disruption in
the market?

Eric Claeys, ir MSc MBA

Co-founder Fassada Steel SA

Global patents



Fassada Steel SA. Who?



Belgian engineering



Swiss manufacturing

Demand & complexity of today's façades

Topics

1. The market needs disruptive solutions: hybrid Steel
2. Drastic reduction of energy consumption
3. Real sustainability
4. Circularity
5. Comforting answer for air pollution in cities
6. Need for shorter execution times
7. Lack of skilled-workers
8. External claddings
9. Energy production by activating dead mass claddings
10. Dynamic shading devices - "keeping the sun out"
11. Making money as a real estate developer?
12. Fire resistance

Disruption means cost savings



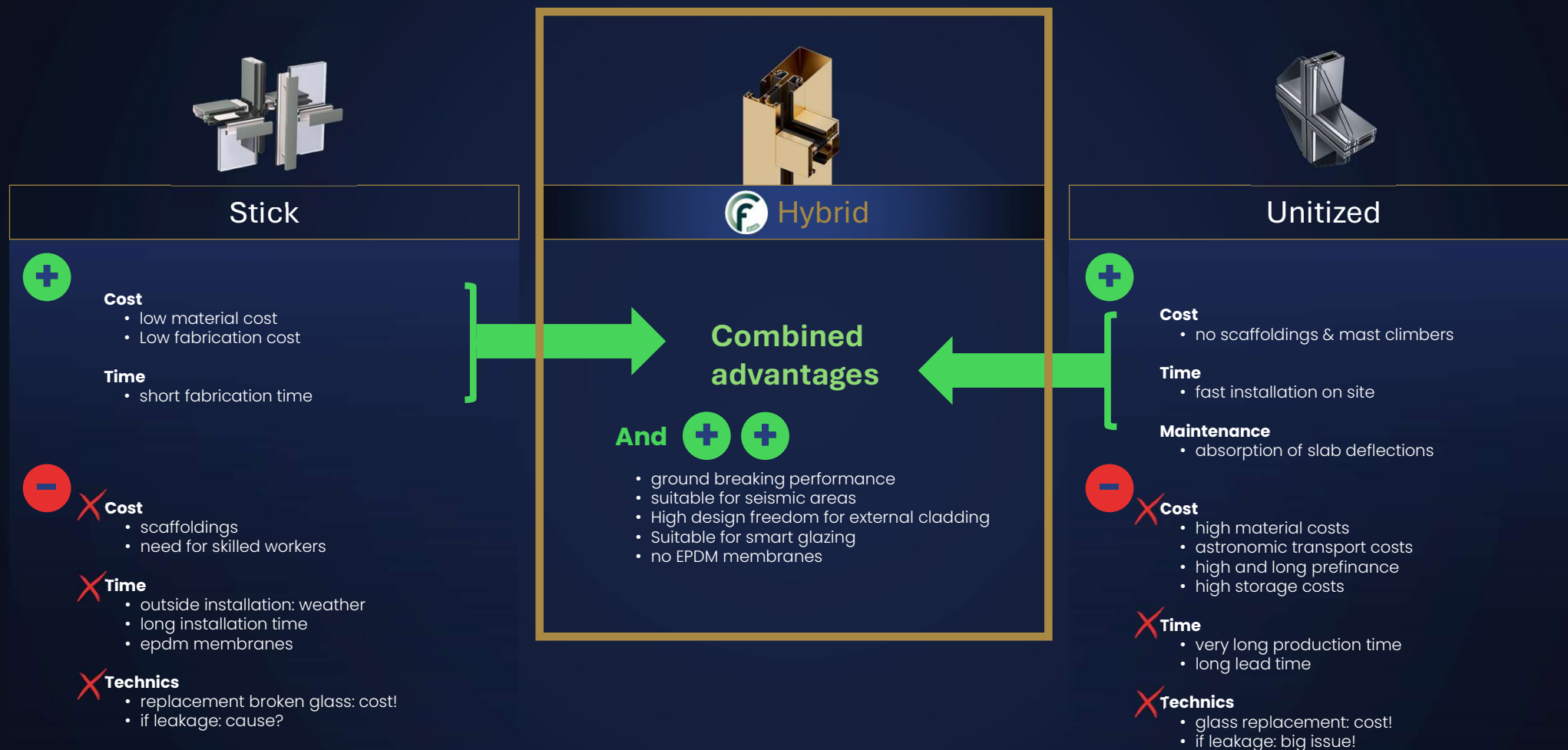
At the end of the day, it's **all about money**

Garry Kasparov



Disruption & cost-saving efficiency goes **hand in hand**

What is a hybrid curtain wall?



Fassada hybrid not only combines the best of both worlds, stick and unitized, but adds a long list of further USP's

USP's of hybrid steel

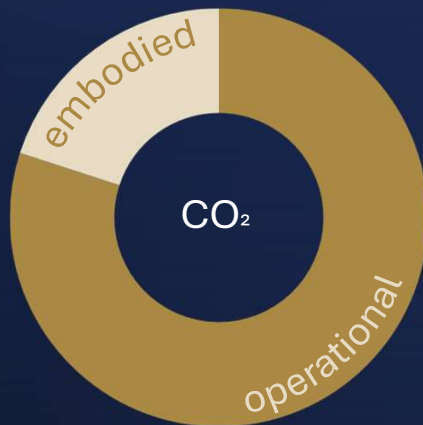


Hybrid steel

- 10 times less CO₂ emission compared to aluminium
- steel = green
- easiness of fabrication: no welding required
- no issue of circularity
- fire resistance
- strong and structurally sound material
- competitive with stick aluminium systems
- significantly more economic than unitized aluminium systems

Drastic reduction of CO₂ emission

Conventional building



Embodied CO₂ 20% → 2%

CO₂ materials: alu --) steel 10x less

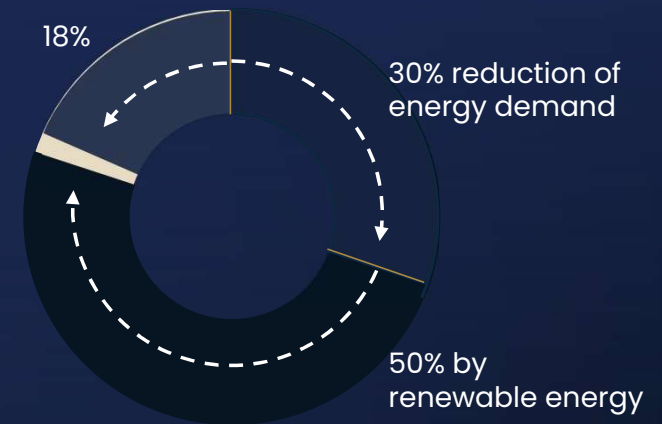


Operational CO₂ 80% → 0%

30% reduction: keeping the sun out

50% balance: by archi. PV panels

Smart building



Real sustainability

Is about saving money!

Combination of

- drastic reduction of CO₂ emissions
- drastic reduction of energy needs
- drastic reduction of transport

Unitized systems

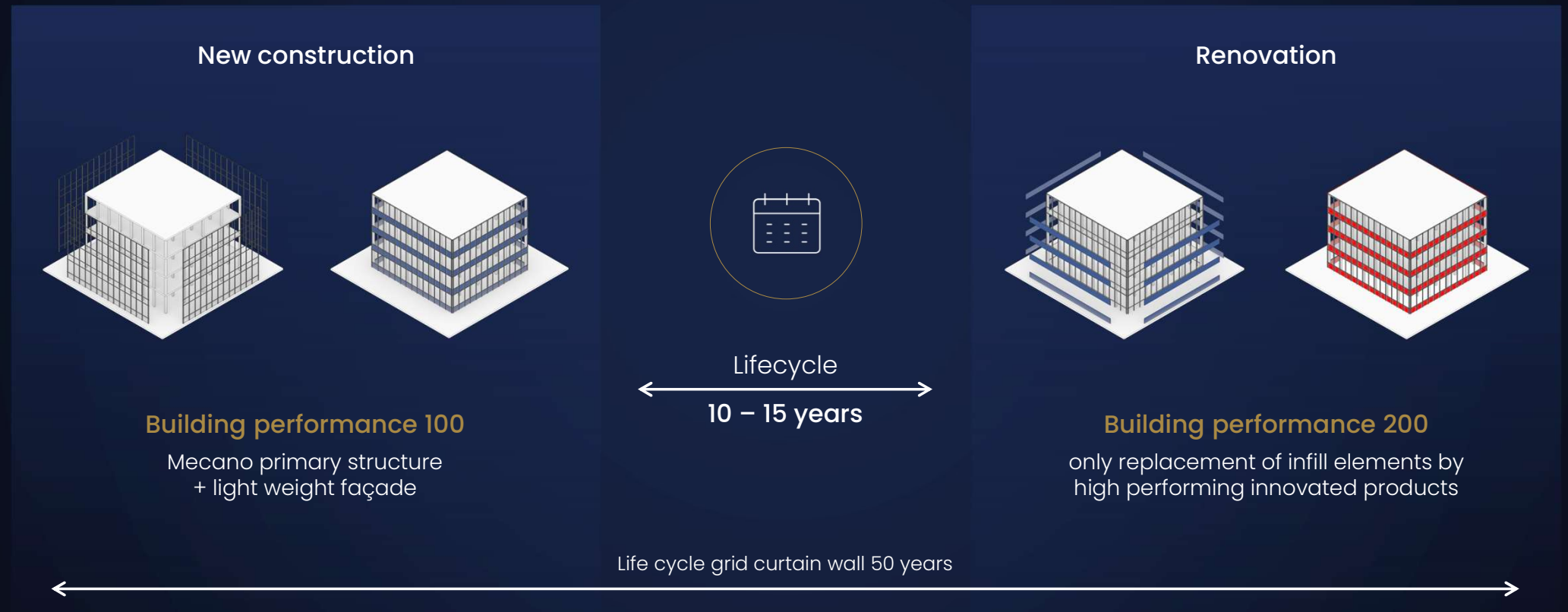


Fassada – hybrid

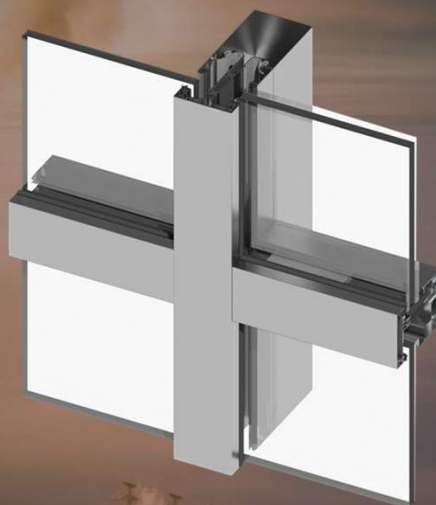


- sustainable products such as green stainless steel and no circularity issue
- social sustainability, access to non – or low-skilled workers
-

The best circularity is no circularity

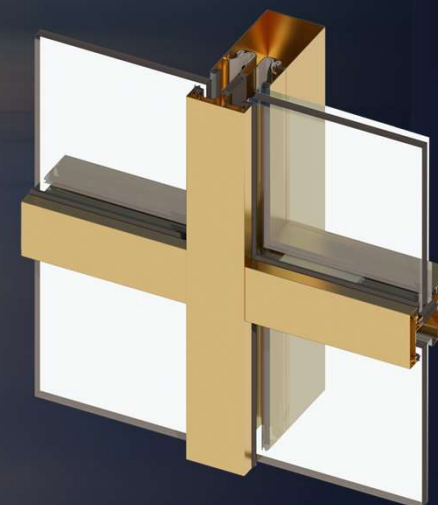


Comforting answer for air pollution in cities



F75-hybrid S

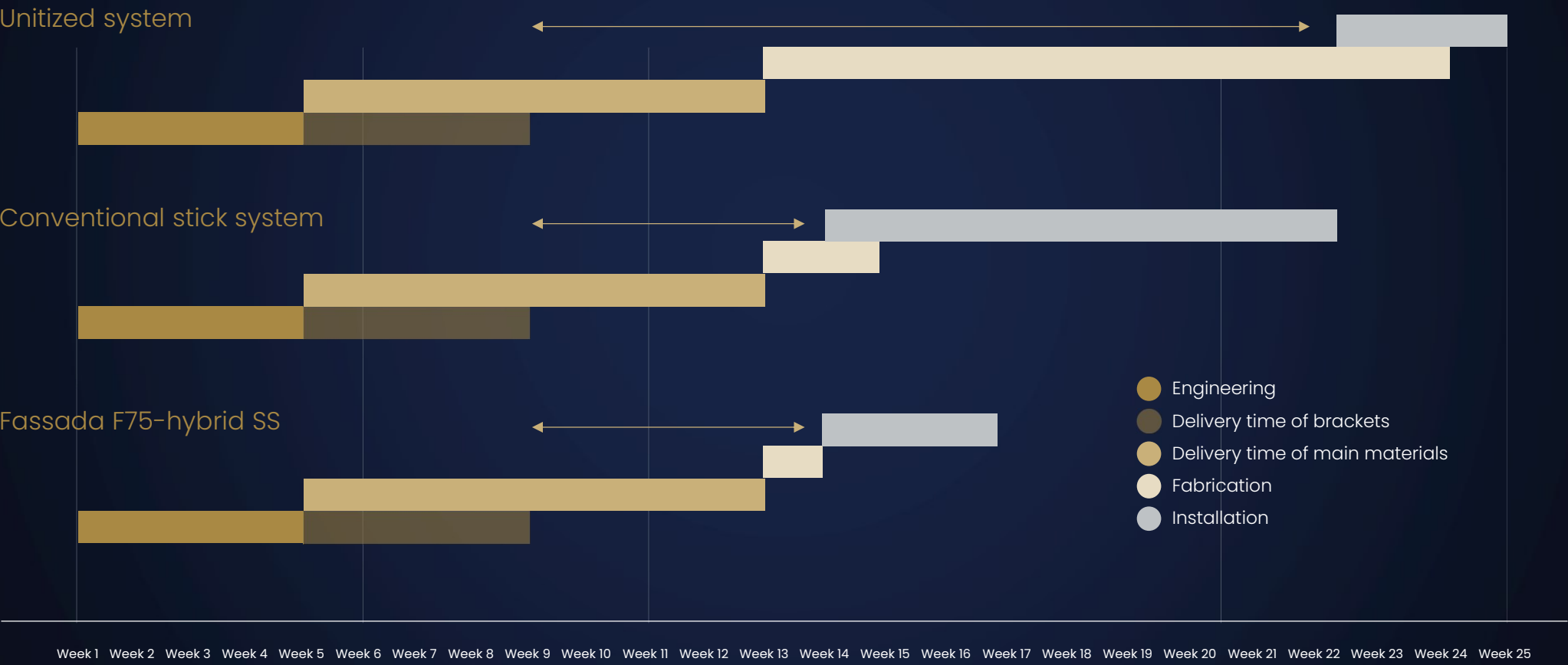
- Galvanized steel system
- Powder coated or wet painted



F75-hybrid SS

- Stainless steel system
- Inside 304L – Outside 316L

Shorter execution times



Lack of skilled workers

Our smart technology is fit for low-skilled workers.

- straightforward & stripped-down solutions
- can be implemented as well by low skilled workers

We do everything in our power to minimise risks.

- easily installable from the inside
- ensuring safest possible implementation

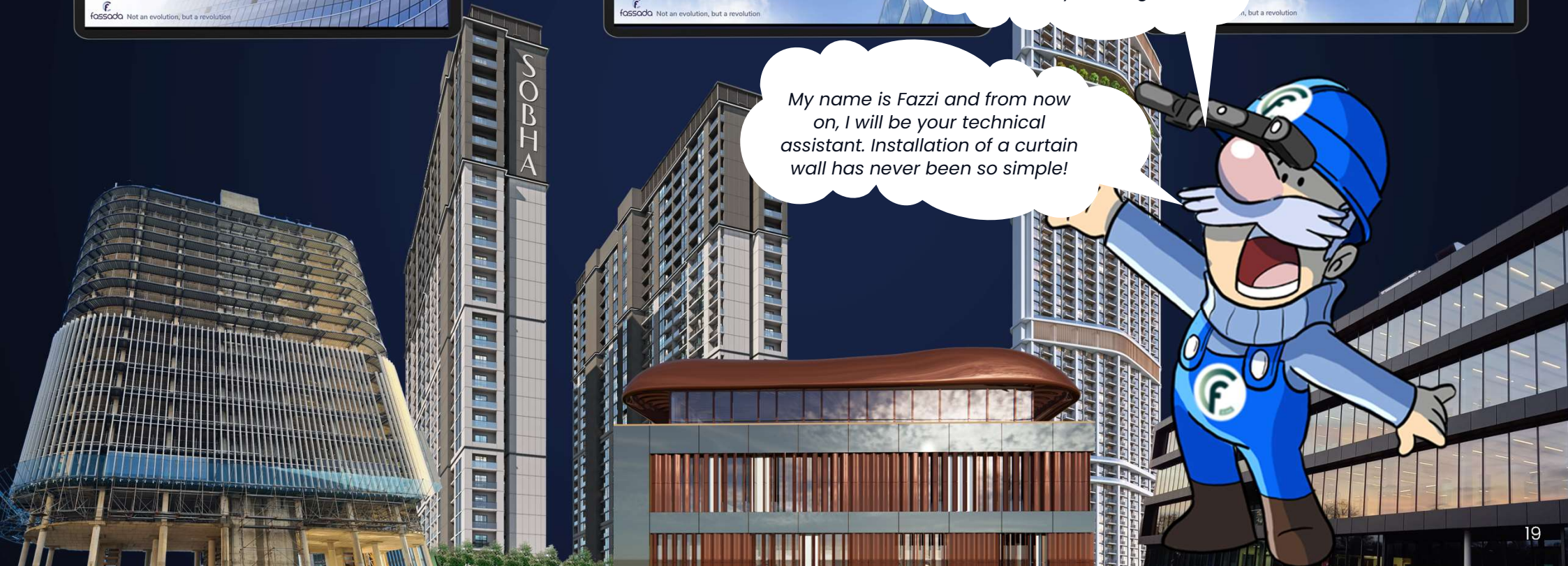


Lack of skilled workers



Over and out with unreadable catalogues. Hybrid helps me with my smart glasses.

My name is Fazzi and from now on, I will be your technical assistant. Installation of a curtain wall has never been so simple!



External claddings

External claddings?

Never been so easy and technically so outstanding good



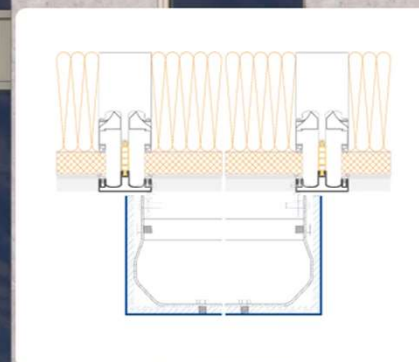
Full installation & glazing from inside



Perfect uninterrupted shield



No silicone, no membranes



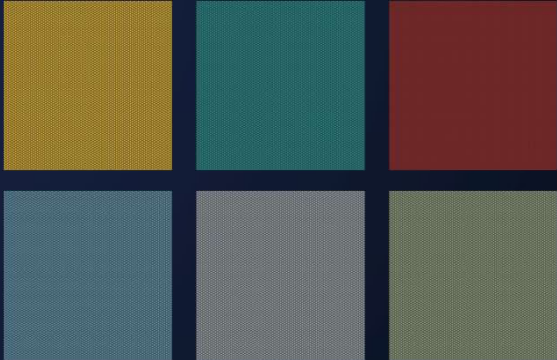
Energy production by activating dead mass claddings



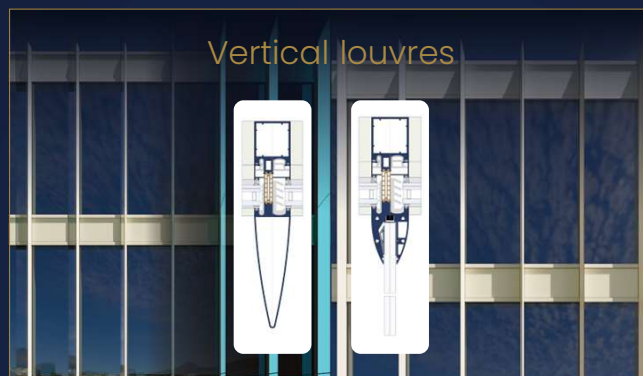
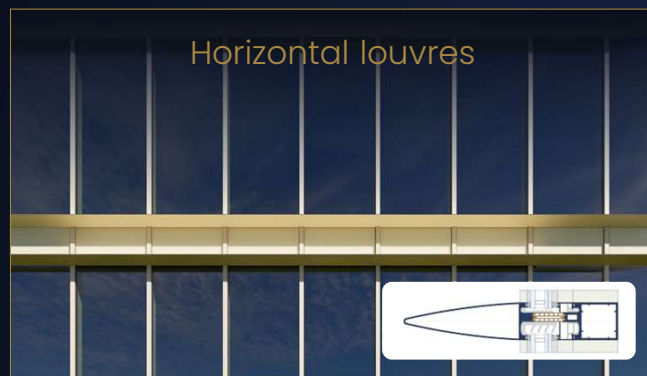
Design
100-160 Wp/m²



Colour
100-160 Wp/m²



Dynamic shading devices – “Keeping the sun out”



Sunshading screens



no walkway
semi ventilated



With walkway
hidden blinds



Bamboo
panels



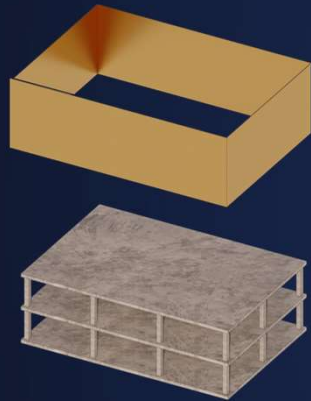
Metal
mesh



- External claddings installed from inside, it's our great love
- Fool proof installation from inside, it's our DNA
- Keeping the sun out, it's our mission
- Smarter, better, easier and ... more cost effective

Making money as a real estate developer?

Reduce the energy need



- The skin is the physical barrier between inside & outside climate.
- Energy costs are directly related to a poor performance of the skin.

//

It's the economy, stupid

Bill Clinton, 1992

//

It's the façade, stupid

Fassada, 2022

Redefined sustainability: not just 0 energy, but also 0 finance cost

Fire resistance

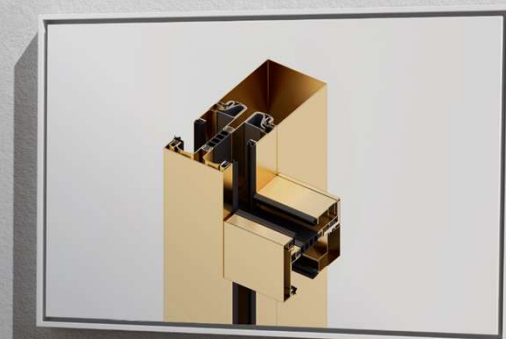
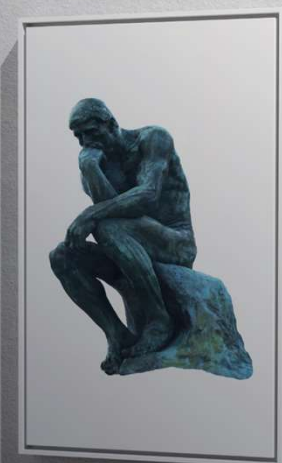


F75-hybrid steel curtain wall systems

Real fire resistance. Tower inferno belongs to the past, once and for all



First we think,
than,
we think to last.





*Dear ladies and gentlemen,
I thank you for your attention.*



HQ Fassada Systems BV - Kanaalstraat 1B, 2240 Zandhoven - Belgium | www.fassada.com | +32 3 385 88 64 | info@fassada.com
HQ Fassada Steel SA - Via Gerrette 4 6855 Stabio, Switzerland | info@fassada.com