

Learning from schools

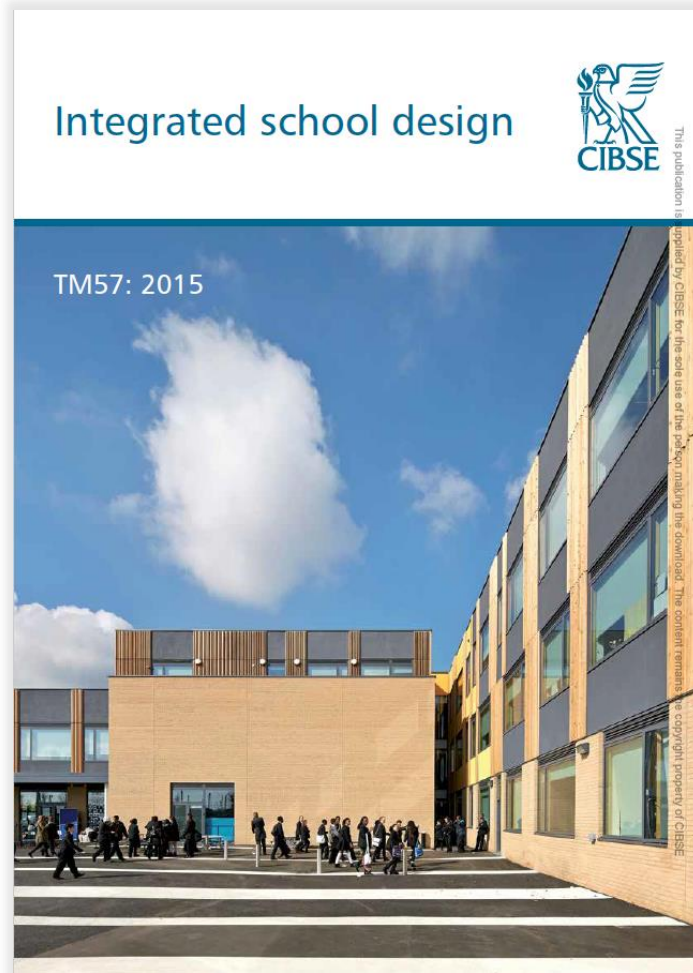
Why building performance matters

Panel debate hosted by CIBSE School Design Group
SPACES Study Day 2018

Ann Bodkin

Education & Skills Funding Agency

CIBSE School Design Group





The cost of a building - Krishna Patel (Manchester School of Architecture)

Do we and the organisations we represent know how the buildings, we are involved in, are performing?

Sarah Morris

Derbyshire County Council

Joe Jack Williams

Feilden Clegg Bradley Studios

The Backbone of Collaboration

**School Performance Debate
15th June 2018
Joe Jack Williams**

joe.jack.williams@fcbstudios.com

Designing new schools

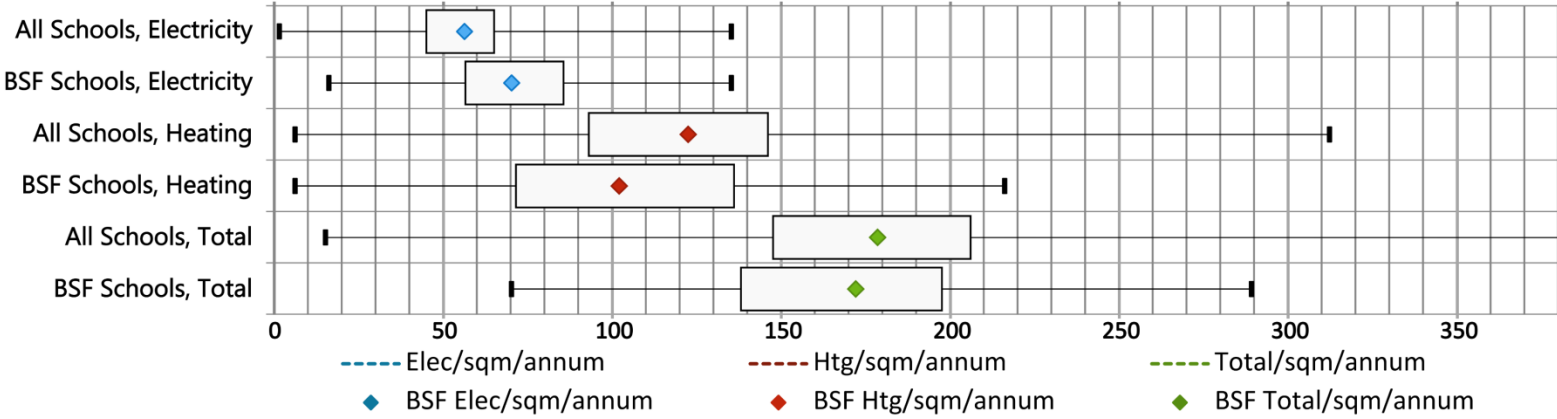
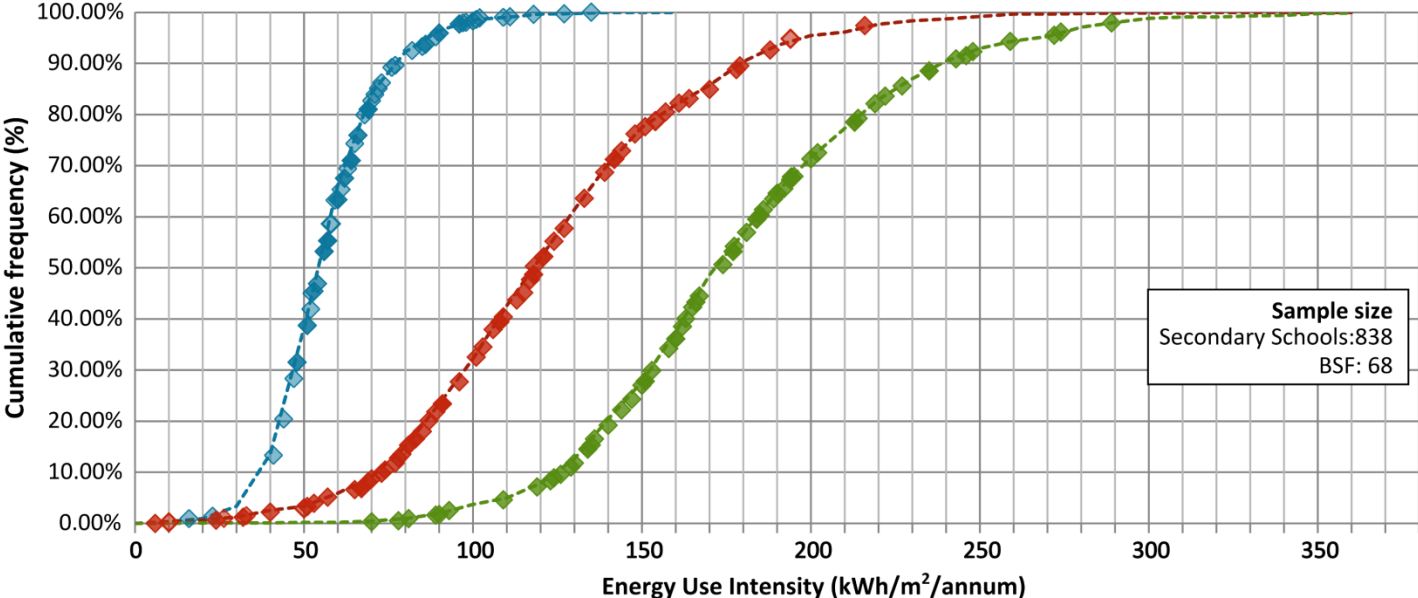
As a building consultant, we like to think that our school buildings:

**provide a comfortable/healthy environment
transform learning
inspire a generation
*will save the planet...***

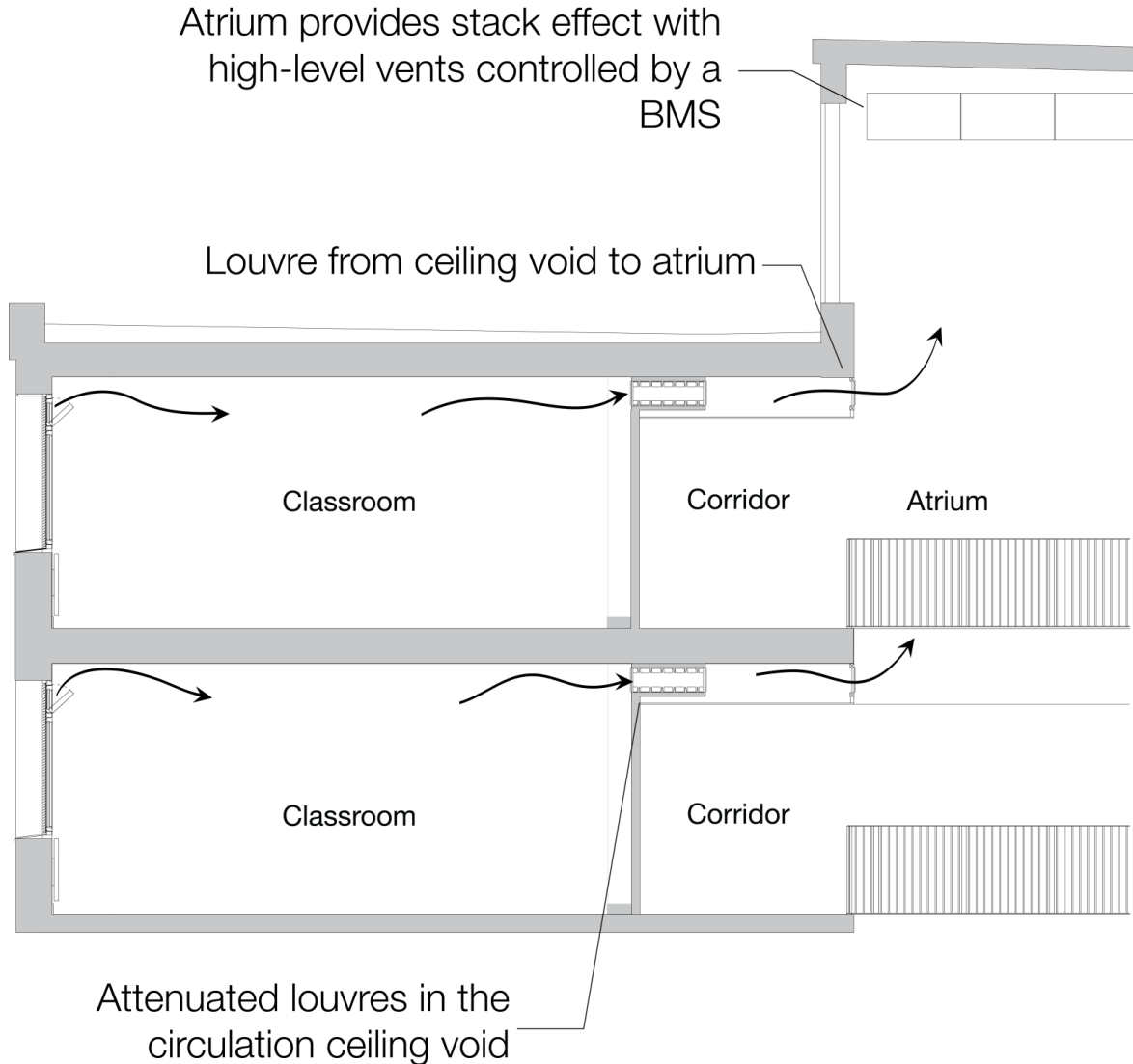
But as an industry, are we actually delivering this?

Energy use in BSF schools

2012 - BSF School Energy Comparison



An intelligible design

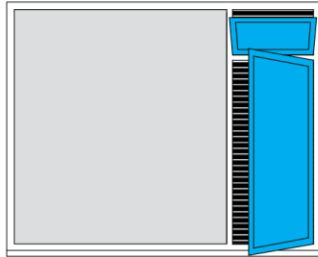


Simply opening the windows is enough to control the ventilation. A process that has no “magic” that everyone can understand...

... With a little help

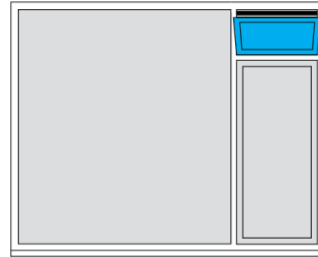
A

Hot Weather
Day Time



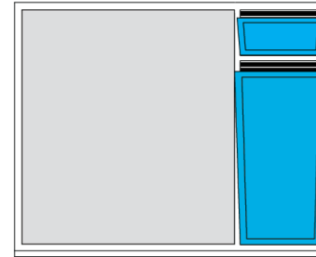
Open all vents as required for ventilation and cooling

Hot Weather
Night Time



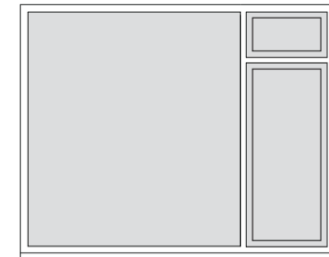
Leave top vent open to cool the building during the night to release the stored heat.

Cold Weather
Day Time



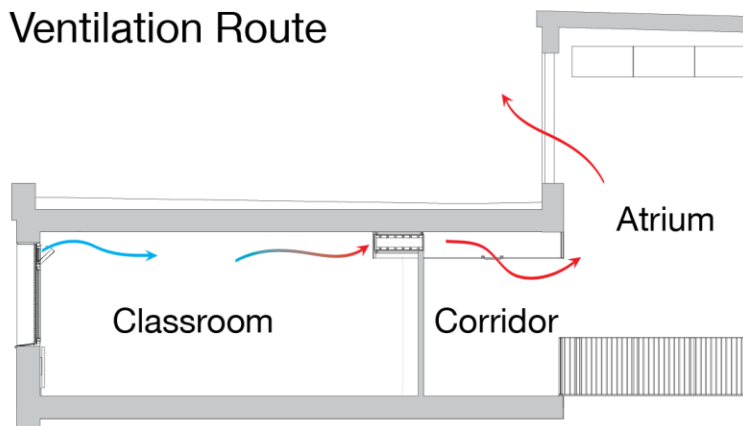
Open top vent for fresh air, if it gets stuffy then open the lower vent as well.

Cold Weather
Night Time



Vents closed to keep in the warmth.

Ventilation Route



Vents in the atria open automatically and are controlled by indoor and outdoor temperature and CO₂ levels.

Collaborating with the occupants

We can do all the things we hope for, but we must:

engage with the occupants at the very start

they should form the 'backbone' of the building

keep the occupants up-to-date with the design and refer back to the 'backbone'

go back to the building after it is completed regularly

Then, tell everyone how the building performs (teachers, students, local authorities, contractors, manufacturers, architects, engineers, magazines, etc...)

Thank you for your time

Joe Jack Williams
Joe.jack.williams@fcbstudios.com

Helen Taylor

Scott Brownrigg

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Why does Building Performance matter?



learning from schools



*a good school building will be one
allowing its inhabitants to grow,
changing their routines easily and
quickly*
Prangnell

Do we know what good looks like?

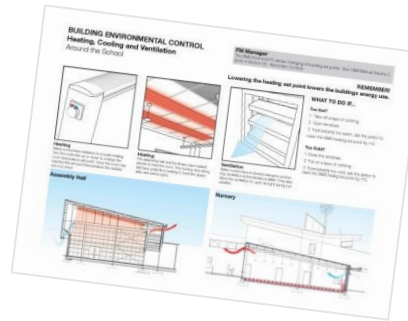
SHEWAN FUTURES ACADEMY

BREEAM®



Energy Efficiency Rating		
	Current	Potential
Very energy efficient - lower running costs		
(92 to 100) A		
(81 to 91) B		
(69 to 80) C	69	71
(55 to 68) D		
(39 to 54) E		
(21 to 38) F		
(1 to 20) G		
Not energy efficient - higher running costs		
England & Wales	EU Directive 2002/91/EC	

BRN: 2835-1067-6235-6349-6900



How do we measure it?



Evidence of how well we performed on the project



Reflect on how the project went after completion



Share key issues and celebrate success



Share lessons learnt cross office and cross sector



Improve our services and maintain client relationships- understand the key issues and Improve client perceptions



Provide feedback to staff



Identify opportunities for thought leadership or research



Benchmark with other practices- fees, quality etc

Why do we care about it?

P.s.
ISO9001 says we need feedback



- Home
- About the Plan
- View the Plan
- Download Plan
- Toolbox
- Help

Customise a Plan

- Tasks
- Stage Guidance
- User Guide

Guidance

The RIBA Plan of Work 2013 consists of eight work stages identified by the numbers 0-7.

7. In Use

This is a new stage within the RIBA Plan of Work. It acknowledges the potential benefits of harnessing the project design information to assist with the successful operation and use of a building. While it is likely that many of the handover duties will be completed during Stage 6, prior to conclusion of the **Building Contract**, certain activities may be required or necessary afterwards. These should be confirmed in the relevant **Schedule of Services**. While the end of a building's life might be considered at Stage 7, it is more likely that Stage 0 of the follow-on project or refurbishment would deal with these aspects as part of strategically defining the future of the building.

Stage 7 is a new stage which includes **Post-occupancy Evaluation** and review of **Project Performance** as well as new duties that can be undertaken during the In Use period of a building.

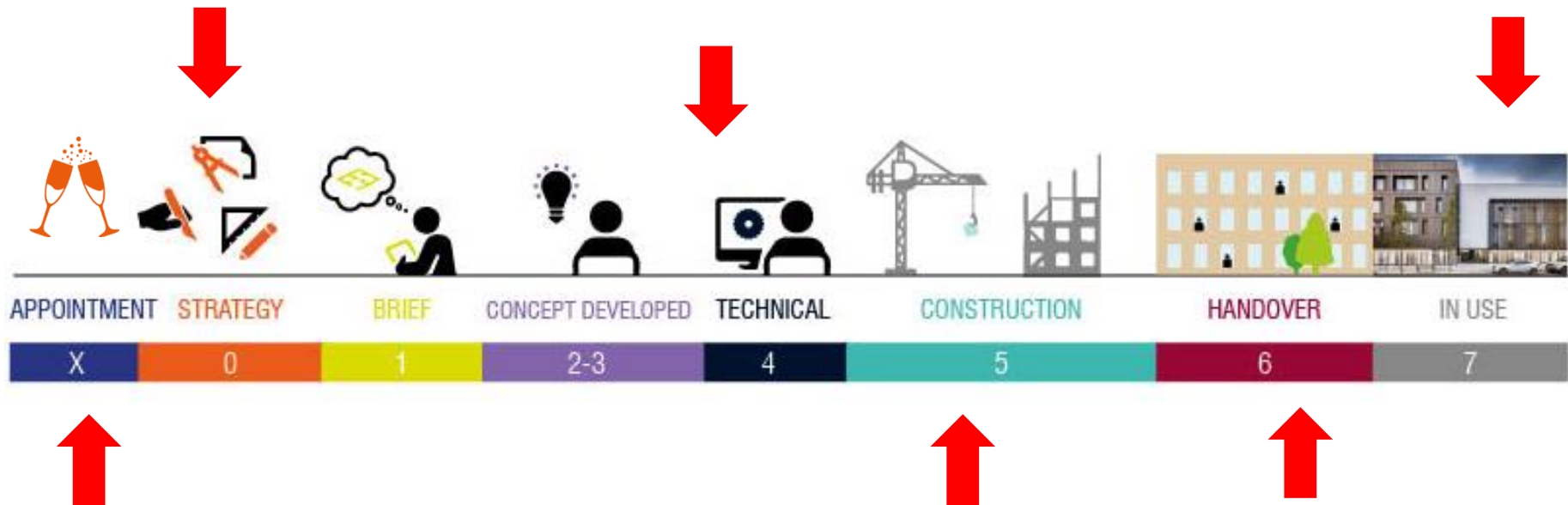
- 0
- 1
- 2
- 3
- 4
- 5
- 6
- 7

Take care to avoid accepting a commission that may involve you in criticising your own work. Where you embark upon such a commission and discover a problem that had not previously come to light, you should consider discontinuing. That may constitute a breach of contract, so please consult the Managers.

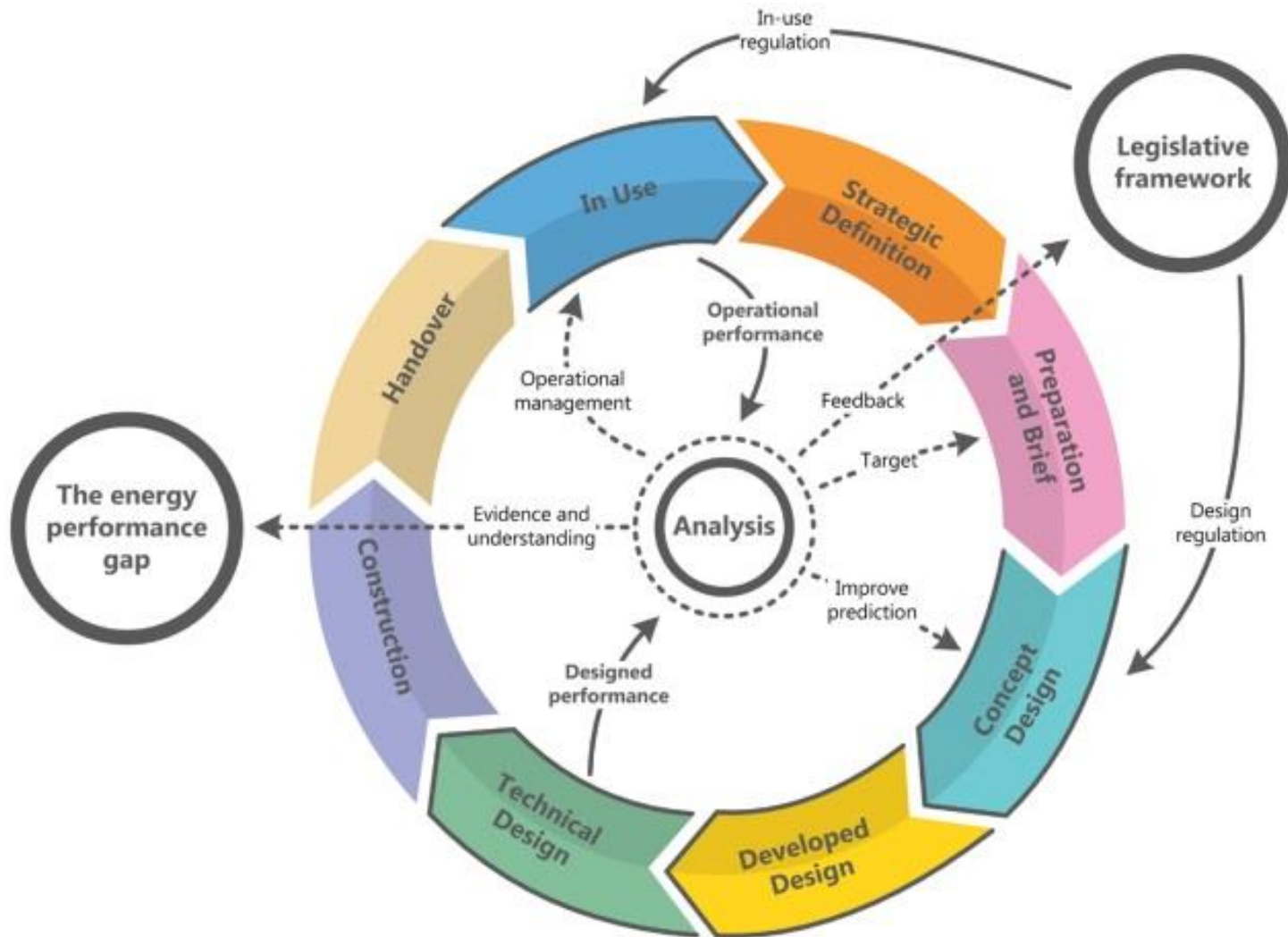
Requirements to monitor a building's operational performance through post-occupancy evaluations can extend up to 36 months from practical completion. This may considerably extend the contractual limitation period which would apply to your services, so you should consider truncating the period of monitoring required by your appointment.

Always obtain your client's written agreement before accepting a commission from third parties such as occupiers and end-users to evaluate the project because any deficiencies you discover may expose your client to claims by those third parties.

So why doesn't it happen?



And when should it happen?



And what would help?

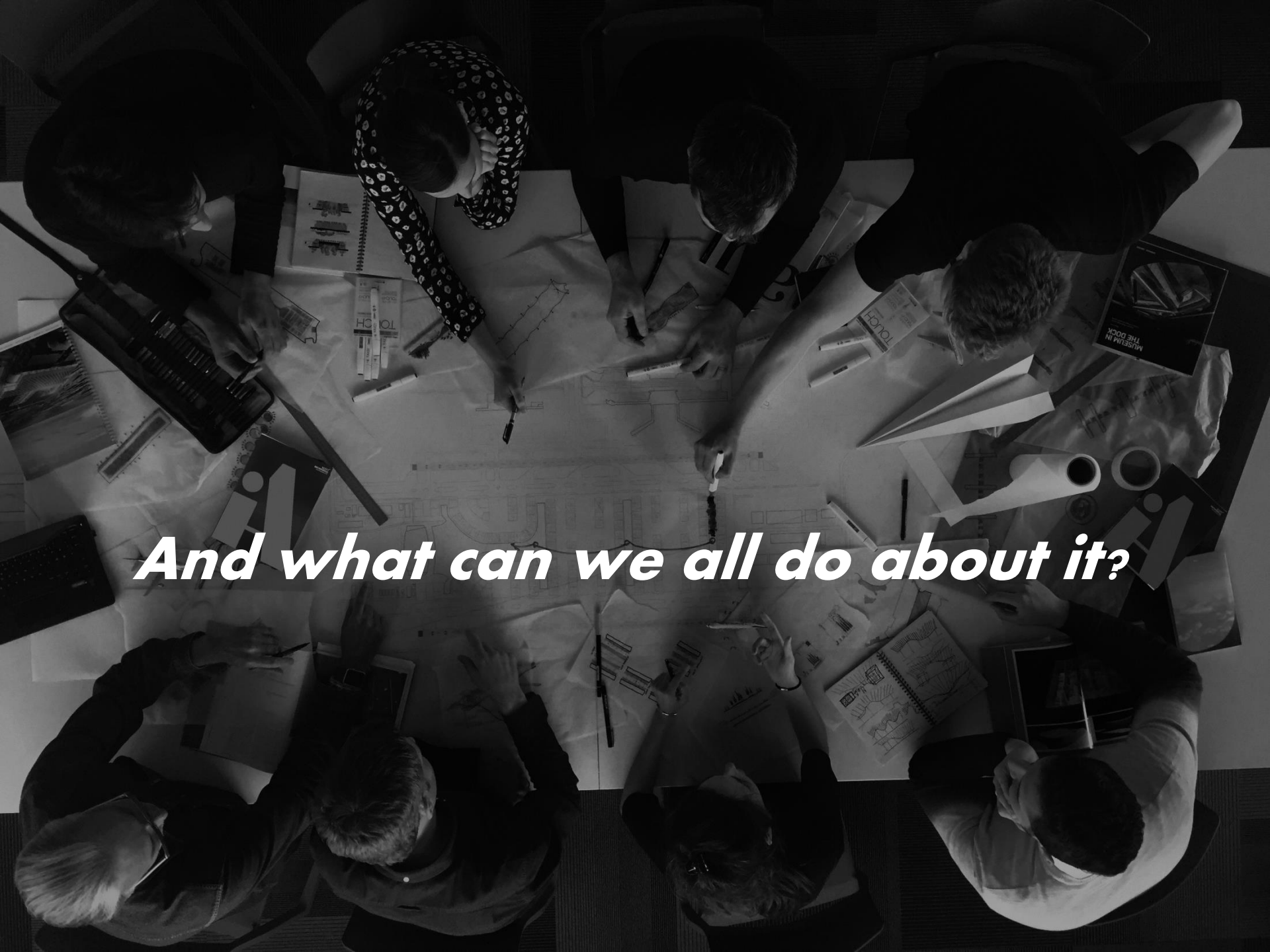
Helen Taylor

[Close Info](#)**BA(Hons) BArch RIBA****Director of Practice**

Helen joined Scott Brownrigg in 2014 as Director of Practice. Whilst she is based in the London office, Helen is responsible for the strategic planning and implementation of programmes to maintain and enhance the high levels of technical competence and expertise across the whole practice, to ensure legal and best practice compliance. She is also responsible for all practice and project related Health and Safety compliance. As well as specialising in education design, particularly Academies, Free Schools and University Technical Colleges, Helen's commitment to sustainability, diversity and inclusive design, will support the implementation of new initiatives to assist the practice in achieving its quality management, sustainability and corporate responsibility objectives.

She is well recognised through her collaboration with industry bodies; Helen was a founder member and co-chair of Architects for Change, the RIBA's Equality & Diversity Forum, Chair of the RIBA Inclusive Design Committee; and Convenor of the RIBA Schools Client Forum. She has recently become co-chair of the new Construction Industry Council Green Construction Panel; is a mentor for the Construction Industry Council Fluid Mentoring Programme; and is involved with the Cabinet Office's Paralympic Legacy project, to improve the inclusive design skills of built environment professionals.

***And what am I
going to do
about it?***



And what can we all do about it?