

Productivity gains through digitisation

James Atkinson

EVP Contract Solutions



The **Built Environment**

\$10 Trillion

Industry that represents



13%

Worlds GDP



7%

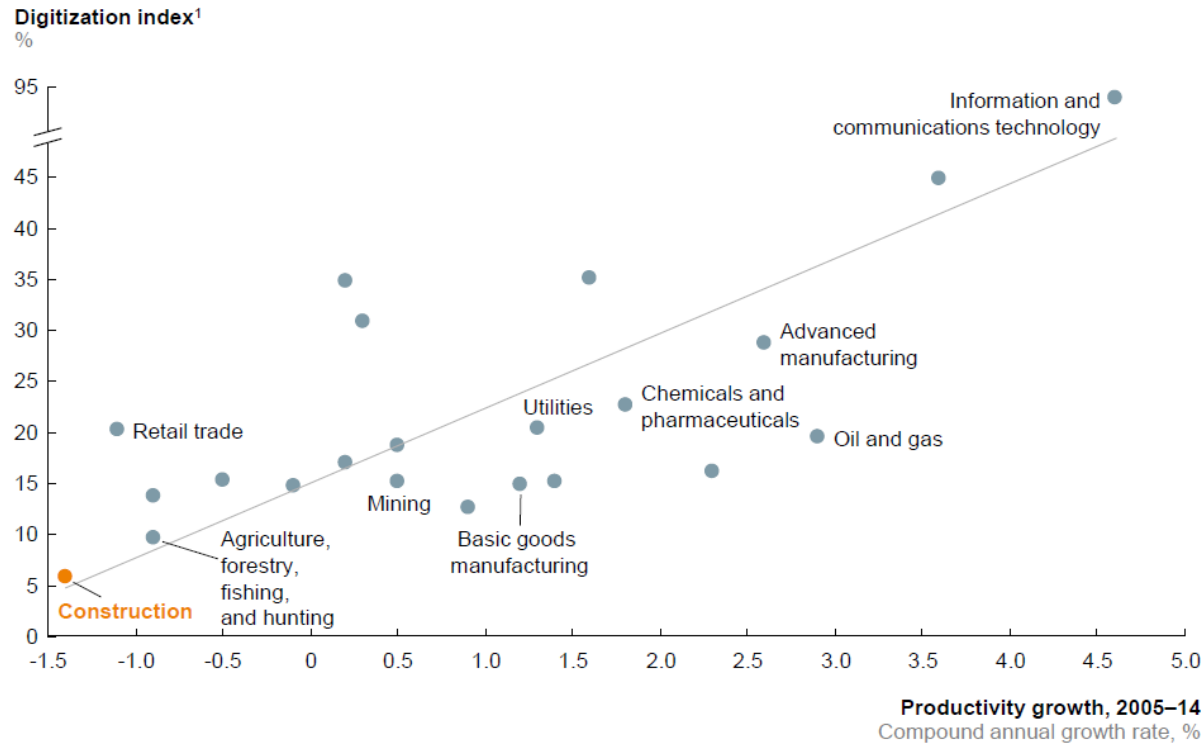
Global Workforce

Our industry builds & operates the structures in which we live and work, that create our energy, and on which we travel . . .
Our industry matters.



Construction **Today**: The Productivity Problem

Lower digitization in construction relative to other industries has contributed to the productivity decline



1%

Increase in annual productivity growth in 20 years.



\$1.6 trillion

Of additional value could have been created through higher productivity.

Construction **Today:** Project Performance



69%

Of UK projects exceeded budgets from 2012-15.



60%

Of projects are not delivered on time.



1.5%

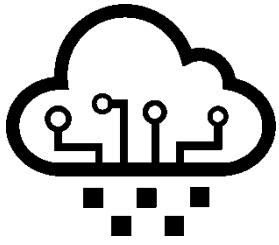
Average pre-tax profit margin achieved by the UK top 100 construction contractors.



67%

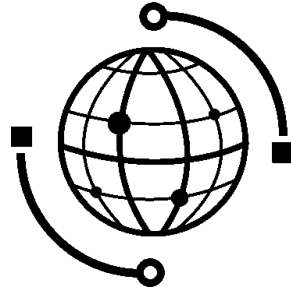
Of young people aged 18-24, would never consider a career in construction.





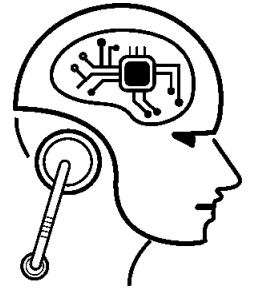
Cloud Computing

Big Data

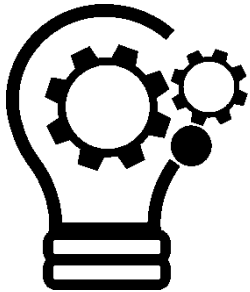


Autonomous Vehicles

Artificial Intelligence

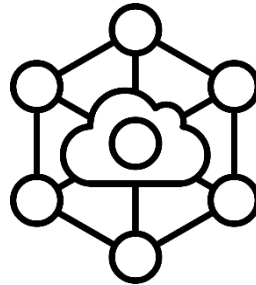
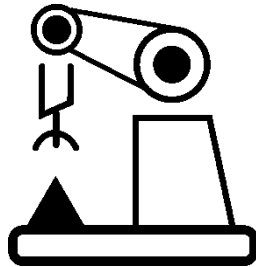


The Digital Revolution



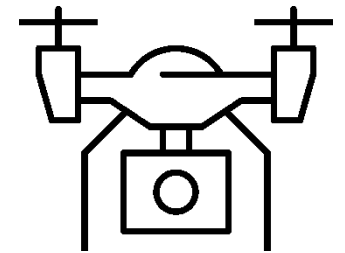
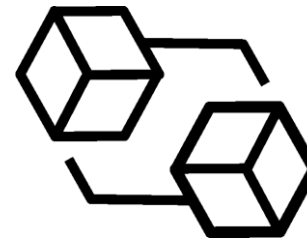
Machine Learning

Robotics



Internet of Things (IoT)

Blockchain



Drones

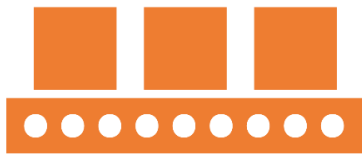
The Fourth Industrial Revolution: **Construction 4.0**

1st INDUSTRIAL REVOLUTION



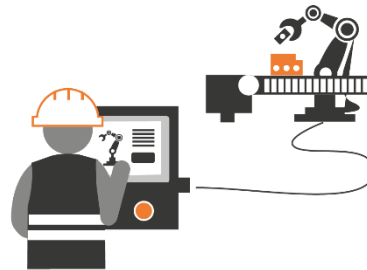
Mechanisation driven by water and steam power
1780s: first mechanical loom.

2nd INDUSTRIAL REVOLUTION



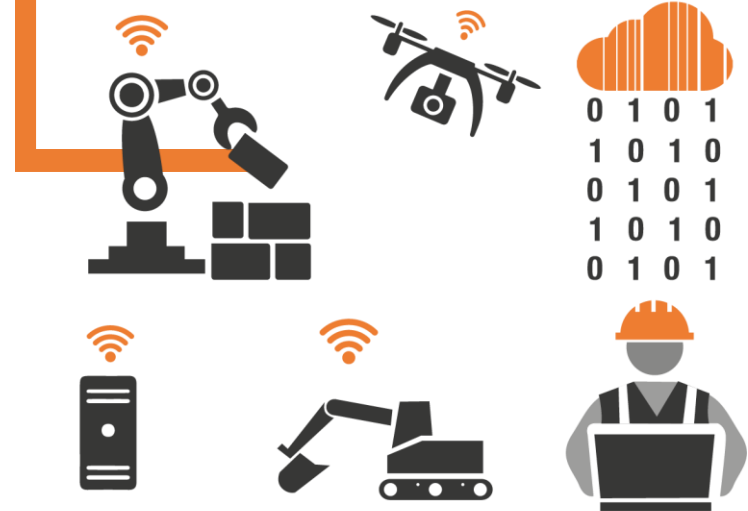
Electricity/mass production
1870: first assembly line

3rd INDUSTRIAL REVOLUTION



Computer automation
1969: first programmable logic controller.

4th INDUSTRIAL REVOLUTION



0	1	0	1
1	0	1	0
0	1	0	1
1	0	1	0
0	1	0	1

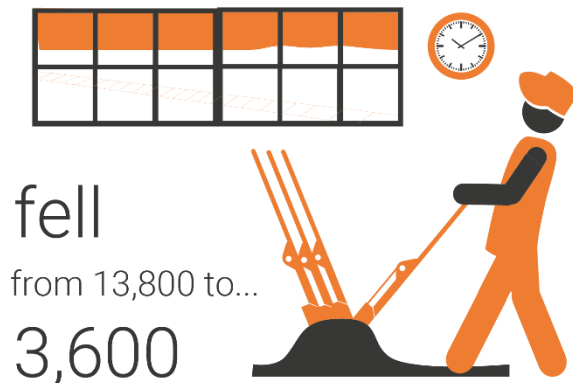
Cyber physical systems
Tomorrow: Internet of Things,
connecting everything.

Construction 4.0: The Impact on our Skills

In Britain between 1979 and 1999 the number of coal mine labourers...

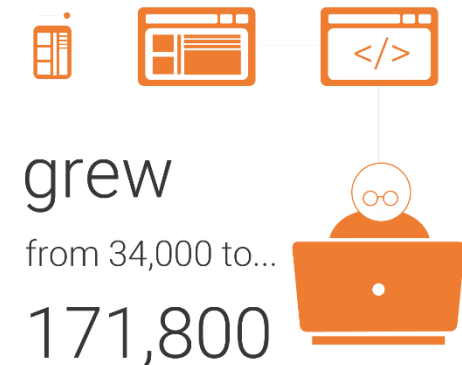


Rail signal operatives and crossing keepers...



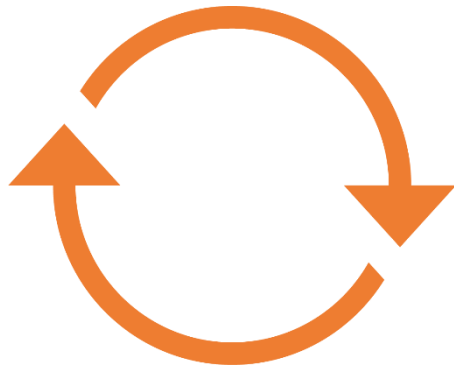
VS

In contrast, between 1979 to 1999, the number of software engineers...



Management consultants and business analysts...





93%

Think technology and innovation will significantly change their business

Yet...

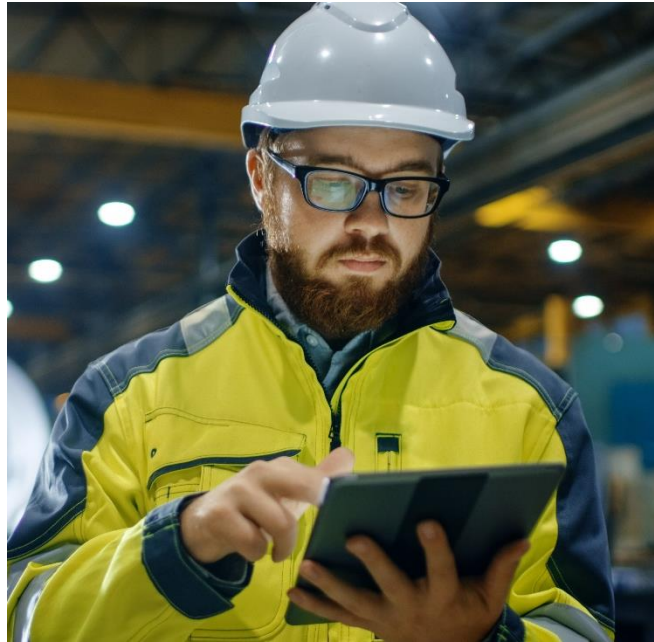
52%

Of organisations have not yet developed a data or technology roadmap





Why does Causeway exist?

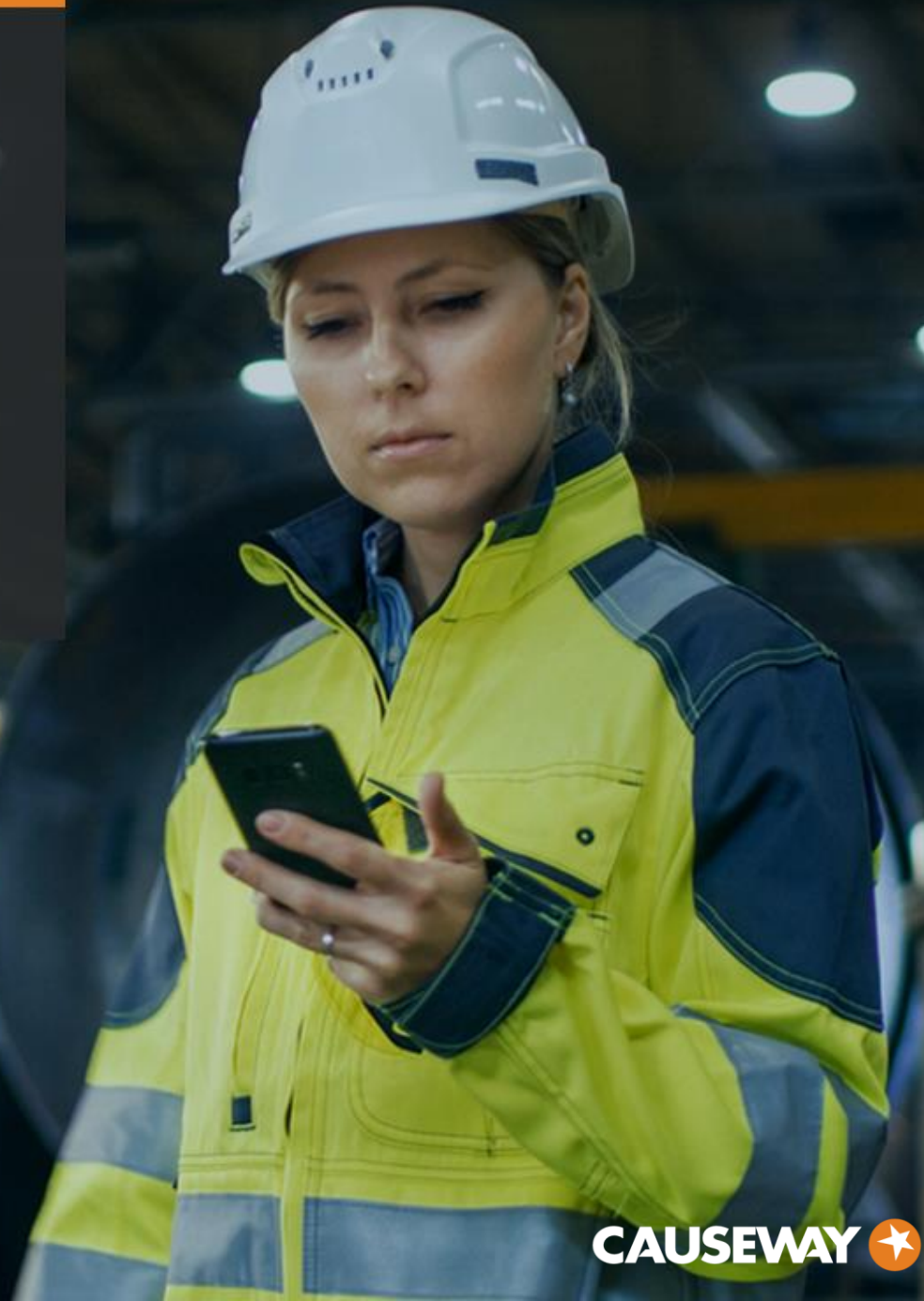


We are the digital partner for construction

We are helping to digitise the front line, because this is where **your profits** are won or lost.

“Every paper form costs us about £13 to process – including printing, reprinting, storage etc. We have now digitised our key forms and processes.”


Business Systems Manager, Kier





“The Causeway platform allows us to remove uncertainty and has saved us 50% of time going through all the paperwork.”

Regional Director, Eurovia



“Through the adoption of the Causeway Platform, there is an opportunity to save up to 60% of time currently taken to register, re-key and match invoices by the accounts payable department”

Barratt Developments

“Thanks to the Causeway platform, we have been able to increase our business from £1 million to £5 million per annum with a key customer.”

Head of IT, GAP Group



“The Causeway solution is proven within our sector, and perhaps more importantly, their people are highways industry professionals – which was evident in their detailed understanding of our needs and challenges.”

IT Manager, R&W





THANK YOU

For more information, please visit [causeway.com](https://www.causeway.com) or
visit us at our stand today.