

Diploma
in Collaborative
Working in
Construction



CONSTRUCTING
EXCELLENCE
Midlands

Collaboration
Leadership
Psychology
Sustainability
Process
Value
Integration
Design
Compliance
Management
Contract
Smart

What's in this document?

COVID-19 has created a different type of crisis to a recession, but the response remains the same – collaboration.

“We must develop a new generation of leaders who can communicate their vision and drive change in culture and behaviours. We need leaders who can help the public understand our contribution to a successful society and economy and help to attract more of the best recruits to our industry.”

Andrew Wolstenholme,
Constructing Excellence, author of
Never Waste a Good Crisis Report

The Need

Why is this Diploma required? **1**

The Proposal

What are we proposing this Diploma will achieve? **2**

The Benefits

How will the Diploma help the delegates and construction? **3**

Courses and Tutors

What will be taught and by whom? **4**

Course Module Example

What can the delegate expect to study on the course? **8**

Costs and Details

How much does the course cost and what are the future plans? **10**

Online programme
hosted by



Why is this Diploma required?

The Need



Andrew Carpenter
Chief Executive
Constructing Excellence Midlands

The Construction Leadership Council has come together since March 2020 to prove that we can collaborate successfully. Its ability to deliver the Site Operating Procedures and keep construction open for business has been recognised throughout Government as ‘best practice’ and held up as an example for others to follow. Now the rest of the sector has to follow suit and this diploma will give candidates the behaviours, tools and techniques they need to do so.

Dame Judith Hackitt commented in her recent review following the Grenfell tragedy:

“We need to maintain the spirit of collaboration and partnership which has been a feature of the review process to date. In a sector that is excessively fragmented, we have seen during this review a will to work together to deliver consistent solutions. This will be especially important going forward to change culture.”

During one recent Constructing Excellence webinar a client commented, when asked “what will prevent the construction industry achieving the *Roadmap to Recovery*”, that the industry knows the word ‘collaboration’ but not the behaviours required to deliver it. If the UK construction industry is to make the culture change we all seek, it is imperative we give our people the tools to do so.

It’s not only the *Roadmap to Recovery* and Building Safety Bill that requires us to understand and deliver collaborative working – post COVID-19 it is a business imperative. With the recently released *Construction Playbook*; contractors making only 1% profit; us struggling to get young people to join the sector; and the global climate crisis, never has there been a more pressing need to collaborate and seek mutually advantageous solutions.

The Proposal

CE Midlands will deliver a twelve month online course on one half day a month followed by additional reading material, homework and an indication how what has been learned will be included in the delegates' day-to-day activities on the following topics:

Introduction to the Principles of Collaboration and Integration in Construction Marc Preite, Sherwood Forest Hospitals, NHS Foundation Trust	1
Leadership & Team Management Vaughan Burnand, VEB Lean	2
ISO44001 Collaboration to include Behavioural Science & Psychology Howard Betts, LeadersMeets	3
Lean and Continuous Improvement Richard O'Connor, Aspen Global	4
Process and Value Stream Mapping Steve Clark, Develop Consulting	5
Value Toolkit to include the Construction Playbook Ann Bentley, Rider Levett Bucknall	6
Design Team Integration Ben Giles / James Bromley, Laing O'Rourke	7
Design for the Environment Paul Chatwin, Cundall	8
Smart Construction (Digital and Offsite) David Emery, Supply Chain Sustainability School	9
Quality and Compliance Steve Green, Bowmer + Kirkland	10
Supply Chain Management Gavin Jamieson / Darren Eaton, Morgan Sindall	11
Collaborative Forms of Contract John Kelly, Freeths	12

Tutors may change due to circumstances beyond our control

The Benefits

Aims to create

- The next generation of leaders
- New behaviours
- Positive disruption
- Technology-led approaches

Individual

- Tools and techniques
- Networking with industry peers
- Developing new contacts
- Develops mutual understanding within the team
- The chance to enjoy working within the construction sector

Employer

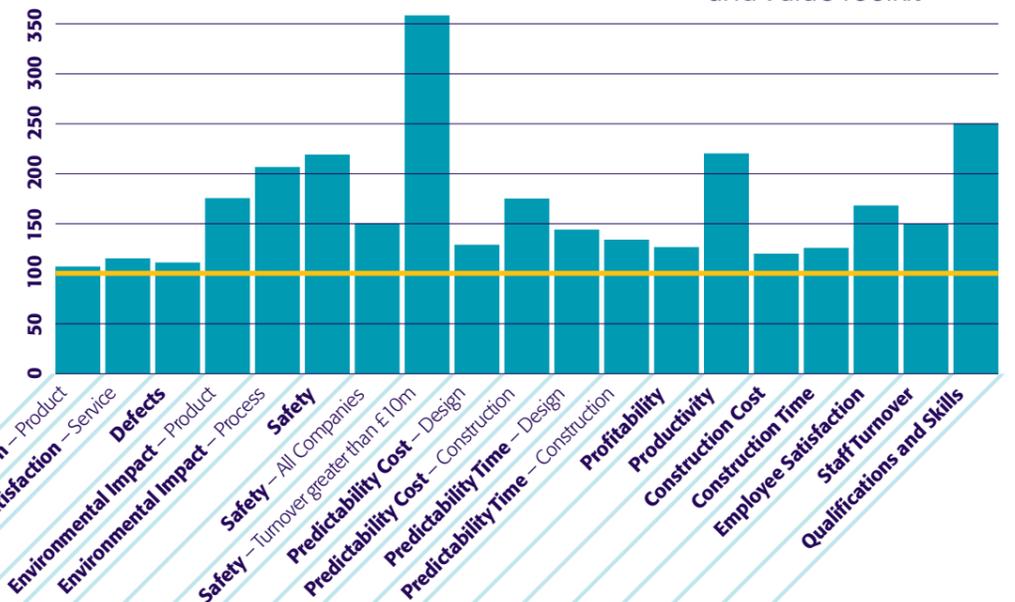
- Preparedness of future leaders
- Preparedness for post COVID-19 recovery
- Positive response to gap analysis in collaboration
- Show potential clients you have staff with accredited collaborative skills

Industry

- Fulfil need identified by clients
- Highlight financial and other benefits as shown below
- Galvanises pockets of best practice into one diploma
- Ability to deliver on industry reports e.g. *Hackitt Review*, *Construction Playbook* and *Value Toolkit*

Constructing Excellence collaborative demonstration projects have outperformed the rest of the industry

CE Demonstration Projects
Industry = 100%



Courses and Tutors

1 Introduction to the Principles of Collaboration and Integration in Construction **Marc Preite**, Sherwood Forest Hospitals, NHS Foundation Trust

This diploma equips delegates with a set of collaboration tools, along with the knowledge of when and how to use them, which is not available anywhere else. The course provides a unique learning opportunity, where clients, consultants and the entire supply chain go through the learning process, together.

On this course you really will develop mutual understanding across all parties, which is the vital ingredient to a long-term collaborative relationship. Arguably there is as much value in the collaborative learning process, as there is in the learning itself.

Marc's experience has included several collaborative service improvement projects for multiple clients such as major housing associations and NHS Trusts. He was one of the national leads on a two-year journey where 20% savings were realised across cost, time and value and increased customer satisfaction to new highs on the delivery of capital and responsive programmes. Marc has lived and breathed collaboration since learning, practising the behaviours, skills, and tools contained within this diploma.

In the first module of the diploma Marc will give an overview of each of the modules and their importance and cover the common issues running through them such as:

- Current issues/factors
- Risk
- Culture and behaviours
- Why it goes wrong
- Common barriers
- Cost versus price
- Value and waste.



2 Leadership & Team Management **Vaughan Burnand**, VEB Lean

With over 40 years' experience in the construction industry, over half of that time in senior leadership roles in companies and the industry as a whole, Vaughan was CEO for Shepherd Construction, Chairman of Constructing Excellence, Chairman of Health and Safety for the Major Contractors Group and CIOB respectively over a period of 10 years.

In this module Vaughan will cover:

- Introduction to leadership at all levels within an organisation
- Key attributes of leaders
- Benefits of leadership training
- Key leadership issues including: -
 - Vision
 - Values
 - Strategy
 - Leadership vs management
 - Attributes of great leaders
 - Leadership styles
 - The key role of leadership
 - Levels of work
 - Maslow's Need Hierarchy
 - Hogan Leadership
 - Communication
 - McKinsey's 7S
 - Change management
 - Handy's Hexagon Contract and social value.

The module is based on Vaughan's own experience in establishing strong leadership and sustainable culture. Leadership is a lifetime issue and the module is to kick start the delegate's enthusiasm and approach to leadership and assist them in developing their own response within their own circumstances.



3 ISO44001 Collaboration: It's about mindset **Howard Betts**, Executive Development

Howard has over 35 years' experience in the field of leadership and organisational development having in this time worked with many leading organisations and brands both nationally and globally. He is the senior partner of Executive Development and co-founder of LeadersMeets Ltd.

This module will look at the key psychological and behavioural factors that impacts collaboration between people and organisations through the lens of 'mindset'. Mindset is extremely influential, for it reflects the beliefs and attitude we have about situations, other people, our organisation, and other organisations – what psychologists refer to as 'objects'. Our mindset impacts the actions that we take; our behaviour; the quality of our relationships; the interactions we have; and crucially in this context, the way we chose to collaborate, or not, with others and thus the quality of our collaboration.

This module will cover:

- Beliefs, Values, Attitude, and Behaviours – our 'Frame of Reference';
- Six common behavioural areas where mindset impacts collaboration;
- Collaborative Behaviours – a 'Competence' approach (ISO 44001);
- Communication – Johari Window
- 'Friction' – Interference Factors and NVA (Non Value Activities) that impact Performance and Collaboration;
- Behavioural 'Gaps' – a 'Mission' approach to Collaboration.



"The course underlines the need for total commitment throughout the supply chain including those tiers beyond the main contractor. Once this commitment is gained, measurement and the recording of that measurement will provide better 'value for money' and equally importantly an understanding of how it was achieved. This very much falls into the current climate of needing to provide 'more for less'. From a subcontractor's point of view it enables them to understand how they can add value."

Steve Port, Kiely Bros

4 Lean and Continuous Improvement **Richard O'Connor**, Aspen Global

Presently a Director at Aspen Global, Richard is a recognised lean practitioner, trainer and coach. In 2002, he successfully led the DTI lean construction pilot and supported the creation of the CLIP programme with BRE. Since then, Richard has held lean manager and director roles in leading UK construction companies and has worked as a consultant helping many construction clients, designers and contractors to achieve impressive improvements in project delivery performance.

In the lean continuous improvement training module Richard will cover:

- Introduction to lean principles, processes and practices
- Benefits of lean construction
- Key lean processes including
 - Lean collaborative planning
 - Visual management
 - 5S workplace organisation
 - Date collection, analysis and root cause problem solving
 - Work observation and productivity improvement
- Other lean processes / practices including gamba walks, standardised work, quick changeover, value stream mapping
- Case studies to demonstrate how key lean processes have helped to 'raise-the-bar' on project delivery performance
- Barriers to success and how to overcome
- Action planning to apply lean to your place-of-work and projects.



5 Process and Value Stream Mapping **Steve Clark**, Develop Consulting

Steve is a Director for Develop Consulting leading the manufacturing and construction sector within the organisation. He has successfully led sustainable process improvement and behavioural change projects delivering significant financial gains in UK, USA and mainland Europe both as a General Manager and also as a senior consultant.

The experience in both manufacturing and construction provides Steve with an extremely well-informed perspective on how modern methods of construction can make a significant difference to the industry. In construction we are all working in line with many processes that come together to create an asset, whether it is a building or part of infrastructure. We all work to processes whether we are on site, developing the design or supporting from the head office and without them we are disorganised and everything is chaotic. To ensure that we are productive and efficient as both individuals and as teams we must make sure our processes are both optimised and reflect what is really happening.

During this module the candidate will learn the following:

- How to analyse and interrogate processes identifying different types of 'Waste'
- How to reduce and where possible eliminate 'Waste' from the process
- How to design efficient and productive processes.

The candidate will learn a range of lean tools that will assist them with understanding and developing efficient processes making the person a great asset to the team.



6 Value Toolkit to include the Construction Playbook **Ann Bentley**, RLB

Ann is a Global Board Director of Rider Levett Bucknall, a Chartered Member of the Institution of Civil Engineers (MICE), a Fellow of the Royal Institution of Chartered Surveyors (FRICS) and has almost 40 years' experience as an Engineer, Project Manager and Strategic Advisor. Ann's current focus is to make positive change to the construction industry. She has several roles supporting cross industry initiatives including membership of the UK Government's Construction Leadership Council (CLC), the Value Toolkit Project Board and the Construction Playbook Industry Steering Group. Ann will address issues of:

- Construction's influence on the wider economy and the importance of delivering outcomes
- Philosophy of value and forerunners to the Value Toolkit and Construction Playbook
- The Construction Playbook – overview and detailed implementation
- The Value Toolkit
 - Client approach
 - Value definition and value-based procurement
 - Ongoing measurement of value.

In developing the Value Toolkit Ann has seen many examples of construction projects failing to deliver business-plan objectives. This is often due to a poor understanding of outcomes and value, and too much haste to get to a solution, rather than understand the problem. The Construction Playbook and the Value Toolkit resolve this by putting the delivery of outcomes at the centre of all decision making.



Courses and Tutors

7

Design Team Integration
Ben Giles / James Bromley,
Laing O'Rourke

Laing O'Rourke is an international engineering enterprise, delivering certainty through experience. Ben Giles is a Senior Project Manager experienced in leading the early engagement and delivery stages of large-scale construction projects in both the UK and North America across the public and private sector. James Bromley is a Commercial Leader with a breadth of operational and organisational leadership experience and in his current role as the Technical Commercial Leader is leading the transformation of how we build more collaborative relationships with our design partners.

This module will include:

- The key macro level challenges necessitating the requirement for design team, client and supply chain integration and collaboration.
- The practical methodologies and mechanisms for best practice integration, e.g. digital collaboration, common data environments, contractual frameworks, golden thread of information and underlying behaviours for optimum outcomes.
- The benefits and underlying value of this approach brought to life through case studies.

Through practical application and operational experience, Ben and James will articulate how we can move from transactional design relationships to a collaborative, integrated design partnership that meets demanding client drivers, macro industry imperatives and delivers best value and certainty.



8

Design for the Environment
Paul Chatwin, Cundall

In 2013 Paul became an Associate at Cundall, the first carbon neutral engineering consultancy in 2020. He leads a specialised team in building physics and environmentally sustainable design. Paul gives guidance to project teams on how the built environment can either comply with planning or legislation or certification schemes, or more importantly how the project may be enhanced from a sustainability, energy performance, carbon emissions and a wellbeing perspective.

This module will provide the following:

- Introduction to sustainability and the role of construction in tackling climate change
- Understanding and reducing energy consumption and carbon emissions in the built environment
- The impacts that materials and the supply chain have on emissions
- The importance in considering the built environments impact on health and wellbeing.

The built environment accounts for a significant portion of the world's greenhouse gas emissions. But how much? How can we influence the built environment to reduce its fair share of consumption and emissions? How can we adapt our buildings for the inevitable impacts of climate change? And, how do we make sure that buildings are healthy and consider our wellbeing?

This module will aim to provide the participant with the general knowledge surrounding these questions.



9

Smart Construction (Digital and Offsite)
David Emery, Supply Chain Sustainability School

David Emery has provided BIM-related specialist advice and consultancy services to a range of clients, including some of the biggest construction companies in the U.K. and has delivered presentations, training and workshops to more than 1,500 businesses.

David is a consultant with the Supply Chain Sustainability School and is that organisation's B.I.M. and Offsite specialist. David also helped deliver another CITB-funded project entitled 'Delivering a Digital Mindset', working with the likes of Tideway, Skanska, Costain and UCL.

In this module we will look at the following:

- What do we mean by offsite and MMC?
- What will offsite mean to the designer, the QS, the procurement lead, the logistics team, the site manager and the project manager?
- What are the characteristics of a digital leader?
- The business case for digital
- Cyber security
- Digital adoption – the construction site of the future.

The successful 21st century construction project will result from a combination of innovative thinking, collaborative working and technological advances. This module will help you understand some of the opportunities that are available and how to instigate change in your organisation.



"The current economic climate of ensuring 'best value' is achieved and the need to maximise the value from each pound spend was the driving force behind my desire to join the course."

Julian Humphreys
Community Health Partnerships

10

Quality and Compliance
Steve Green, Bowmer + Kirkland

Steve has recently joined the Frameworks Team in Bowmer + Kirkland, following over 40 years in construction. Working for both national and regional contractors in Commercial, Design Management, Procurement and Business Improvement roles, Steve has a wealth of experience from a multitude of perspectives.

In his interactive session Steve will address:

- Some quality roles and definitions
- What happens when we get it wrong?
- How much does poor quality cost the industry?
- How does it go wrong?
- How can we prevent it going wrong in the future?
- Behaviour and culture in quality – making change 'stick'
- What will you do differently tomorrow?

Combining Design Management, Commercial and Business Improvement skills, Steve is passionate about *connecting up the dots*, both within and across businesses, to deliver a collaborative approach to quality.

Delegates will be equipped with the necessary knowledge and skills to understand both the real cost and root cause of error. The ability to spot in advance where the risks to poor quality lie in a project and how to avoid them. Following the course, delegates will be equipped to work collaboratively in reducing error and thereby improving productivity across the industry. Whether Client, Consultant, Tier 1 or Tier 2, we all have a role to play in changing our behaviour in regard to quality.



11

Supply Chain Management
Gavin Jamieson / Darren Eaton,
Morgan Sindall

Gavin Jamieson and Darren Eaton both work for Morgan Sindall Construction. Gavin is Head of Supply Chain UK and Darren is Commercial Director for the Midlands. Collaboration is embedded in our processes and can be seen from the relationships formed between our supply chain managers and construction teams both regionally and on our projects. This then is reflected throughout the supply chain to deliver best value.

Working collaboratively with our supply chain we seek to reduce unnecessary risk and waste generally associated with construction projects. Positive relationships drive projects to deliver on time, safely and to a high quality.

Within our module we will cover topics such as:

- Creating a shared success culture
- Forming an open culture that will support the achievement of mutual benefits
- Sustainable supply chain principles including decarbonisation and social value
- Upskilling and supporting all industry participants
- Developing equitable risk allocation and driving innovation
- Continuous Improvement across the supply chain.



12

Collaborative Forms of Contract
John Kelly, Freeths

Presently a Director at Freeths LLP, John has over 39 years experience in the construction industry and has occupied many roles, from project manager, to chartered quantity surveyor before re-training as a construction specialist solicitor in 1999. In these roles, John has worked for industry leading firms, including Gardiner and Theobald, Turner and Townsend; Beachcroft Wansborough and Freeths LLP.

Whilst technically a dispute lawyer, John's particular role within his current firm is to assist on live problem projects with a view to steering them towards a better outcome.

John will address the issues of:

- Does Collaborative Procurement need a contract?
- What types of Contract support collaborative procurement?
- What standard form contracts support collaborative procurement?
- How does a Framework Alliance Contract Operate?
- How does a Team Alliance Contract Operate?
- What are the causes of disputes in construction contracts and how can Collaborative Procurement reduce disputes?

John has observed over the years how construction disputes often have a common DNA with predictable driving factors that cause disputes. John believes these driving factors can be addressed by collaboration and will explore and set out how such measures can be reflected within a legal framework.



What can the delegate expect to study on the course?

Example Course Module

An impression of what a module might look like for delegates on the fourth section of the course, Lean and Continuous Improvement.

“One of the biggest benefits of the Diploma Course to date has been the understanding of different ways of doing things and also being in the same room as other members of the supply chain. This has led to an understanding of the processes and needs of others. The realisation that it is critical to get the ‘right’ contractor is apparent”.

Neil Biddiscombe
Advantage South West

Lean and Continuous Improvement – An Introduction

Module Leader: Richard O'Connor, Aspen Global

Module Content:

	What	Timing	Cumulative
1.	Open and overview of the session Introducing Lean <ul style="list-style-type: none"> The performance of the construction sector - putting Lean into context Definition of Lean Brief history Principles including the 3 elements of work On-line poll to gather views on the level of 'waste' in the construction sector 	20 mins	20 mins
2.	Interactive activity <ul style="list-style-type: none"> Demonstrating lean principles 	10	30
3.	Small on-line 'break-out' group activity <ul style="list-style-type: none"> Question(s): <ul style="list-style-type: none"> What are the key issues, blockers and wastes that you have experienced on a construction (or infrastructure) project? What impact do these issues / wastes have on project performance? Feedback and discussion 	30	60
	Break	10	70
4.	Applying lean to enhance the performance of construction & infrastructure projects <ul style="list-style-type: none"> Introducing the key 'process' based lean practices that will have a beneficial impact: <ul style="list-style-type: none"> Lean collaborative planning & project management Visual management 5S Workplace organisation Data collection, analysis and root cause problem solving Work observation and productivity improvement 		
		15	85
		10	95
		10	105
		10	115
		15	130
	Break	10	140
5.	Overview of other lean processes – Gemba /waste walks, standardised work, quick changeover, value stream mapping and analysis	15	155
6.	Making lean real – Overview and discussion of selected case studies <ul style="list-style-type: none"> Lean design Lean collaborative planning Improving workflow RDMAICT problem solving Productivity improvement 	50	205
7.	Maximising the beneficial impact of lean - Introducing the lean project pathway	10	215
8.	Lean applied to construction – Benefits, challenges and summary <ul style="list-style-type: none"> On-line interactive poll – What do you think are the 'barriers to success'? 	10	225
9.	Module homework – Waste data collection & analysis plus actions to eliminate & improve plus quantified beneficial impact	10	235

Costs and Details

Course cost: £2,500 per delegate

Note: A discount of 20% will apply for 3 or more delegates for those wishing to send attendees from your own organisation and / or from your supply chain.

Each module will take place commencing September 2021 as follows:

9.00am – 1.00pm on the last Wednesday of each full calendar week (except Christmas week)

Podcasts:

A podcast has been recorded discussing the nature of the course. Others are planned for future release. [Listen here](#)

Once the initial course is underway it is proposed to expand and extend the offer to include:

- Individual modules
- Twelve-week courses
- White Papers for each module
- Level 5 accreditation through association with Nottingham Trent University, Wolverhampton University, Swansea University and University of the West of England. They will assist with the assessment of the modules to ensure academic rigour.
- Level 3 & Level 4 qualifications and evening sessions

Requirements:

- 10 hours per module (4 hours per taught module plus 6 hours of homework / reading)

“The format of the course is good and doesn’t interfere too much with one’s day-to-day job. The business opportunities that may follow are also a positive side to attending the course with real business relationships already forming between delegates.”

Les Carter
Willmott Dixon



**CONSTRUCTING
EXCELLENCE
Midlands**

For more information contact us at:

info@cemidlands.org
www.cemidlands.org

Disclaimer

This publication is for information purposes only and does not constitute advice including legal advice. It is recommended that specific professional advice is sought through your professional advisor before acting on any of the information or opinion given.

The views and opinions expressed in this publication are those of the relevant authors and do not necessarily reflect the views and opinions of Constructing Excellence Midlands nor the other authors.

Copyright

Copyright in all and every part of this publication rests with Constructing Excellence Midlands, and all rights are reserved. Save by prior consent of the authors, no part or parts of this publication may be reproduced in any form or by any means electronic or mechanical, including photocopying, recording or any information storage or retrieval system now known or to be devised.

Copyright © Constructing Excellence Midlands.

v1 - 19.02.21