

Civil engineering technicians support the planning, design, building, management, maintenance or dismantling of the built environment and infrastructure, by using their engineering knowledge and technical know-how to prepare and produce plans, designs and documentation to relevant codes of practice, and to industry and statutory standards.

## Core duties involve:

- Civil Engineering Understanding and applying core engineering and mathematical principles and techniques to assist in the development of technical civil engineering solutions.
- Information and data analysis Collecting, interpreting and analysing information, which contribute to technical to civil engineering solutions.
- Communication Using digital technologies, such as CAD and BIM, to prepare and produce engineering drawings to specifications, and to industry codes, practices and regulations.
- Environmental impact and sustainability Using environmental policies and practicing sustainable principles to assist in sustainable development and net-zero carbon emissions.

# Key elements include:

- Working independently and as a member of a team.
- Communicating and liaising effectively with others in your workplace, and with customers, internal or external stakeholders.
- Supporting in the development and presentation of reports and documents.
- Ensuring safe systems of work are applied and risks mitigated.
- Using quality management and assurance systems to proactively plan, manage and contribute to projects.
- Addressing ethical conduct, equality, diversity and inclusion.
- Carrying out and maintaining competence in line with professional codes of conduct.

#### **Approved training providers:**



Solihull College



outh thames college









#### Professionally recognised by:













Association for Consultancy and Engineering (ACE), Leytonstone House, 3 Hanbury Drive, London, E11 1GA. T: 020 7222 6557 www.acenet.co.uk/resources/tac/





# **Training programme:**

- 30-month training programme.
- Entry with good GCSEs including Maths and English typically sought.
- Minimum 20% off the job training including completion of:
  - · Mandatory Pearson BTEC in Civil Engineering
  - Development of competence via Pearson's Diploma in Civil Engineering for Technicians (Institution of Civil Engineers).
  - Portfolio of evidence prior to EPA.
- Development of EngTech competence supported by on the job mentors.

## Four month EPA:

- Mandatory four month End Point Assessment (EPA) to complete apprenticeship
- EPA Gateway requires successful completion of training programme and portfolio.
- · EPA includes:
  - · Project set by EPA organisation.
  - Professional Interview with portfolio.
- Grades: distinction/pass/fail.
- Aligned to EngTech professional review process with ICE, CIHT, IStructE and IHE.
- · Registered EPA organisation: ICE

**Funding band assigned:** £14,000 (increased from £12,000 in July 2021).

#### **Additional costs:**

- Providers may charge employers above the funding band
- Professional membership and Engineering Council registration fees (optional).

**Reviewed and re-approved:** Reapproved July 2021. First approved: October 2017.

**Employers involved:** Adept Consulting, Aecom, Arup, Balfour Beatty, BDP, Capita, Cormac, Clancy, Cormac, Curtins, EDF, Mott MacDonald, Stantec, Systra, TFL, Wiltshire Council, WSP.

Others involved: Pearson, Institution of Civil Engineers (ICE)\*, Chartered Institution of Highways and Transportation, Institute of Highways Engineers, Institution of Structural Engineers, Stegta, Leeds College of Building, Solihull College and University Centre, Permanent Way Institution.

\*advised EPA organisations

