

CEng Competence Statement

CONFIDENTIAL WHEN COMPLETE
STATEMENT OF COMPETENCES TO BE FILLED IN BY CANDIDATES FOR CEng
TO BE RETURNED WITH YOUR APPLICATION FORM

The following information provides examples showing how you consider that you meet the competences for Chartered Engineer as set out in the ENGINEERING COUNCIL Standard for Professional Competence.

You may use a few or as many words as you feel are appropriate to convey your evidence for each competency. However, it would be appreciated if you could keep it short and concise at under 300 words per competence.

Chartered Engineers must be competent throughout their working life, by virtue of their education, training and experience, to:

A. Use a combination of general and specialist engineering knowledge and understanding to optimise the application of existing and emerging technology.

A1. Maintain and extend a sound theoretical approach in enabling the introduction and exploitation of new and advancing technology.

This could include an ability to:

- Identify the limits of own personal knowledge and skills
- Strive to extend own technological capability
- Broaden and deepen own knowledge base through research and experimentation

Please type your responses below:

A2. Engage in the creative and innovative development of engineering technology and continuous improvement systems.

This could include an ability to:

- Assess marketing needs and contribute to marketing strategies
- Identify constraints and exploit opportunities for development and transfer of technology within own chosen field
- Promote new applications when appropriate
- Secure the necessary intellectual property rights
- Develop and evaluate continuous improvement systems

Please type your responses below:

B. Apply appropriate theoretical and practical methods to the analysis and solution of engineering problems.

B1. Identify potential projects and opportunities.

This could include an ability to:

- Establish and help develop solutions to meet users' requirements
- Consider and implement new and emerging technologies
- Enhance engineering practices, products, processes, systems and services
- Use own knowledge of the employer's position to assess the viability of opportunities

Please type your responses below:

B2. Conduct appropriate research and undertake design and development of engineering solutions.

This could include an ability to:

- Identify and agree appropriate research methodologies
- Allocate and manage resources
- Carry out the necessary tests
- Collect, analyse and evaluate the relevant data

- Undertake engineering design
- Prepare, present and agree design recommendations, with appropriate analysis of risk, and taking account of cost, quality, safety, reliability, appearance, fitness for purpose, security, intellectual property (IP) constraints and opportunities, and environmental impact.

Please type your responses below:

B3. Manage implementation of design solutions and evaluate their effectiveness.

This could include an ability to:

- Ensure that the application of the design results in the appropriate practical outcome
- Implement design solutions, taking account of critical constraints, including due concern for safety and sustainability
- Determine the criteria for evaluating the design solutions
- Evaluate the outcome against the original specification
- Actively learn from feedback on results to improve future design solutions and build best practice.

Please type your responses below:

C. Provide technical and commercial leadership

C1. Plan for effective project implementation.

This could include an ability to:

- Systematically review the factors affecting the project implementation including safety and sustainability considerations
- Define a holistic and systematic approach to risk identification, assessment and management
- Lead on preparing and agreeing implementation plans and method statements
- Ensure that the necessary contractual arrangements with other stakeholders (clients, subcontractors, suppliers etc.)

Please type your responses below:

C2. Plan, budget, organise, direct and control tasks, people and resources.

This could include an ability to:

- Set up appropriate management systems
- Define quality standards, programme and budget within legal and statutory requirements
- Organise and lead work teams, coordinating project activities
- Ensure that variations from quality standards, programme and budgets are identified, and that corrective action is taken
- Gather and evaluate feedback, and recommend improvements

Please type your responses below:

C3. Lead teams and develop staff to meet changing technical and managerial needs.

This could include an ability to:

- Agree objectives and work plans with teams and individuals
- Identify team and individual needs, and plan for their development
- Reinforce team commitment to professional standards
- Assess team and individual performances, and provide feedback

Please type your responses below:

C4. Bring about continuous improvement through quality management.

This could include an ability to:

- Promote quality throughout the organisation and its customer and supplier networks
- Develop and maintain operations to meet quality standards

- Direct project evaluation and propose recommendations for improvement.

Please type your responses below:

D. Demonstrate effective interpersonal skills

D1. Communicate in English with others at all levels.

This could include an ability to:

- Contribute to, chair and record meetings and discussions
- Prepare letters, documents and reports
- Exchange information and provide advice to technical and non-technical colleagues

Please type your responses below:

D2. Present and discuss proposals.

This could include an ability to:

- Prepare and deliver appropriate presentations
- Lead and sustain debates with audiences
- Feed the results back to improve the proposals
- Raise the awareness of risk

Please type your responses below:

D3. Demonstrate personal and social skills.

This could include an ability to:

- Know and manage own emotions, strengths and weaknesses
- Be aware of the needs and concerns of others, especially where related to diversity and equality
- Be confident and flexible in dealing with new and changing interpersonal situations
- Identify, agree and lead work towards collective goals
- Create, maintain and enhance productive working relationships, and resolve conflicts.

Please type your responses below:

E. Demonstrate a personal commitment to professional standards, recognising obligations to society, the profession and the environment

E1. Comply with relevant codes of conduct.

This could include an ability to:

- Comply with the rules of professional conduct of own professional body
- Work constructively within all relevant legislation and regulatory frameworks, including social and employment legislation

Please type your responses below:

E2. Manage and apply safe systems of work.

This could include an ability to:

- Identify and take responsibility for own obligations for health, safety and welfare issues
- Ensure that systems satisfy health, safety and welfare requirements
- Develop and implement appropriate hazard identification and risk management systems and culture
- Manage, evaluate and improve these systems
- Apply a sound knowledge of health and safety legislation

Please type your responses below:

E3. Undertake engineering activities in a way that contributes to sustainable development.

This could include an ability to:

- Operate and act responsibly, taking account of the need to progress environmental, social and economic outcomes simultaneously
- Use imagination, creativity and innovation to provide products and services which maintain and enhance the quality of the environment and community, and meet financial objectives
- Understand and encourage stakeholder involvement in sustainable development
- Use resources efficiently and effectively

Please type your responses below:

E4. Carry out continuing professional development necessary to maintain and enhance competence in own area of practice.

This could include an ability to:

- Undertake reviews of own development needs
- Plans how to meet personal and organisational objectives
- Carry out planned, and unplanned, CPD activities
- Maintain evidence of competence development
- Evaluate CPD outcomes against the plans made
- Assist others in their own CPD

Please type your responses below:

E5. Exercise responsibilities in an ethical manner.

This could include an ability to:

- Give an example of where you have applied ethical principles as described in the Statement of Ethical Principles
- Give an example of where you have applied/upheld ethical principles as defined by your organisation or company, which may be in its company or brand.

Please type your responses below: