T-LEVELS | Institute for Apprenticeships & Technical Education

T Level Technical Qualification in Engineering, Manufacturing, Processing and Control

Employer-Set Project (8730-034)

Task 2
Autumn 2023

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Task 2 – Report

You are to create a written response to the project brief outlining your suggestions for the 'go/no-go' gauge design.

With reference to the project brief and your research notes, you need to write a report which outlines your proposed design for the 'go/no-go' gauges. This must include details of your intended approach to designing an internal gauge and external gauge with consideration of:

- the reason for the tolerance on the stock stainless steel tube
- the type of 'go/no-go' gauge designs that could be used for the range of sizes
- why you've selected this design in relation to gauging the outside diameter and the internal bore
- what material(s) you've selected for the gauges to be manufactured from, why it's suitable and the reasons for not selecting other materials
- the manufacturing processes you have chosen for the production of the gauges and how this has influenced the design
- anthropometric and ergonomic considerations for handling the gauge
- health and safety considerations relating to the design proposed.

The written report will typically be 2000 words.

You can include extracts from Original Equipment Manufacturers (OEM) catalogues showing tooling aids, excerpts or information derived from BS, DIN, ASME or ISO standards, basic design sketches, or images to support your intended approach as detailed in your report.

Timing of assessment

- You will have **four hours** to complete your report.

Conditions of assessment

- Your report must be completed working alone under supervised conditions.
- You must not share or discuss your work with other candidates.
- You will have access to a copy of your response to the previous task (for review purposes only).
- You will have access to the Internet for the completion of this task.
- Assessment evidence must be handed in at the end of each session for secure storage which cannot be accessed.

What you must submit on completion of this task

- **Written report** (typically 2000 words) hard copy or file saved securely (e.g., in a secure online location or on memory stick to be handed in).

Marks available

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Get in touch

City & Guilds Technicals Quality Team

We are here to answer any queries you may have regarding your T Level Technical Qualification delivery.

Should you require assistance, please contact us using the details below:

T: 0300 303 53 52 (Monday - Friday | 08:30 - 17:00 GMT)

E: technicals.quality@cityandguilds.com

W: cityandguilds.com/tlevels

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