Candidate 4

The evidence for this candidate has achieved the following marks for each question/section of this Course Assessment component.

Question 1(a)

The candidate was awarded **6 marks** because they provided 6 explanations of why the materials had been chosen:

- ◆ Tubular steel good strength to weight ratio
- ♦ Waterproof cloth fade resistant
- ♦ Nylon rigid/durable
- ♦ Galvanised Steel corrosion resistant
- Polypropylene comfortable grip
- ♦ Rubber tough/durable

Question 1(b)

The candidate was awarded **6 marks**. Three processes identified with suitable explanations:

- ♦ Extrusion long lengths/uniform cross section
- Press forming repeatable/increased strength through folding
- ♦ Injection Moulding economies of scale

Question 1(c)

The candidate was awarded 3 marks.

- Physiology (2 marks) easy to lift due to lightweight materials and handles
 - manoeuvrability because of one wheel/pivot
- ♦ Psychology (1 mark) whole statement

Question 1(d)

The candidate was awarded 5 marks.

- Easy to load
- ♦ Easy to manoeuvre
- ♦ Stable
- Easy to fold
- Easy to unload
- Durability

Question 1(e)

The candidate was awarded 4 marks.

- ♦ Readily available
- ♦ No time/money wasted producing components
- Pre-Quality assured
- Wide choice of components gives manufacturer flexibility

Question 2(a)

The candidate was awarded 2 marks.

- ♦ Cheaper than solid timber
- ♦ Wide variety of looks available

(no marks for strong and durable)

Question 2(b)

The candidate was awarded 2 marks.

- ◆ One piece construction to increase strength
- Mould can be used multiple times (economies of scale)

Question 2(c)

The candidate was awarded 1 mark for the Gantt chart statement

Question 3(a)

The candidate was awarded 2 marks.

- ♦ Hollow/less material used
- Repeatability

(no marks for complex shapes statement) ??

Question 3(b)

The candidate was awarded 3 marks.

 Correct material and two correct reasons (strong and durable/scratch resistant/range of colours).

Question 3(c)

The candidate was awarded 2 marks.

- Nothing sharp and pointy
- ♦ No small parts
- ♦ No hazardous chemicals

Question 3(d)

The candidate was awarded 3 marks

- Recycled materials
- ♦ Less chemicals during manufacturing
- Reduced packaging

Question 4(a)

The candidate was awarded 2 marks.

- ◆ Durability on building site
- ♦ Charge power tool batteries

Question 4(b)

The candidate was awarded 1 mark

Whole statement shows some understanding of anthropometrics

Question 4(c)

The candidate was awarded 2 marks.

Marks awarded for clear but basic description of a user trial.

Question 4(d)

The candidate was awarded 2 marks.

- Customer recommendations
- Assumed quality

Question 5(a)

The candidate was awarded 2 marks.

- Survey statement
- ◆ Product comparison statement

Question 5(b)

The candidate was awarded 2 marks.

- Unique ideas
- ♦ Expensive to hire

Question 5(c)

The candidate was awarded **0 marks** because they provided an incorrect response to the question.

- Spider diagram is generally used as an analysis tool
- Morphological analysis incorrectly described.

Question 6

The candidate was awarded **3 marks** because they have displayed a limited knowledge and understanding of aesthetics although some fair points were made.

Total 53 Marks