

Solutions

2.1 Contribution per item=price–variable cost=40–24=16 units/item. Break-even quantity=fixed cost/contribution=4,800/(16 units/item)=300 items. Margin of safety=expected sales–break-even=360–300=60 items. Capacity 280 is below break-even, so the assumed 360 sales are infeasible without changing capacity or costs. HL may examine quality, contingency and information systems; claims require operational evidence. Authored points for identifying relevant evidence, explaining a supported inference and a material limit.

3.1 Contribution per item=price–variable cost=36–24=12 currency units/item. Break-even quantity=fixed cost/contribution=4,800/12=400 items. At expected sales of 360, margin of safety=360–400=–40 items; the model predicts a shortfall. Capacity and demand must be checked again. Authored points for a relevant judgement, reason tied to the case and justified qualification or method. Accept a supported alternative.