

Implementing ISO 14001 Case Study

Manufacture

This is a five-stage process:

1. Plastico makes steel moulds or extruders
2. The company does trial run of prototypes
3. Prototypes are tested by Plastico and the client before full production begins
4. Final production begins on a schedule drawn up and agreed with the client
5. After sales service is provided and modifications are integrated into the manufacturing process

Spray painting

Plastico spray paints 46% of the components it makes for the consumer and automotive industries. The painting is a traditional, high-solvent coatings process which uses a two-stage spraying (a priming, base coat and a top coat), and single-stage drying process.

The company uses 22 tonnes of solvents per year, and 17 tonnes of paints. These are all delivered in 205 litre drums, which are stored outside in a designated compound. The company has a Part B process authorisation from the local authority and has to submit emissions monitoring results every six months.

Delivery

Following the packing process, components are dispatched to Plastico's on-site warehouse located within the building. Delivery to the client is by Plastico's own delivery fleet of 10 vehicles and drivers, or by using one of three subcontractors or the client's own transport. On the rare occasions that any rework is required, the same system for transportation is used. The company subcontracts its vehicle maintenance to Nynebridge Fleet Management, which is currently being prosecuted for oil and diesel spills into the River Nyne.

Plastico produces a number of waste streams.

1. Used solvents and paint sludge which are mostly recovered and collected by the suppliers for recycling
2. Plastic waste from the moulding process
3. Plastic packaging – eg drums and film – from raw materials delivery (47 tonnes per year)
4. Broken pallets (15 tonnes per year)
5. Waste from the catering facilities and staff areas
6. Air emissions of solvents
7. Effluent from the process wash-water

Apart from the waste solvents and sludge, Plastico employs a waste contractor to dispose of wastes. The contractor supplies and collects skips as needed.