# Green packaging

## Assessment

### Packaging engineering challenge

|  |  |  |  |
| --- | --- | --- | --- |
| Criteria | Beginning | Achieved  | Exceeded |
| Needs analysis | Describes needs relating to materials and form.  | Describes needs of a range of stakeholders and relates these to materials and form. | Describes key stakeholder needs and relates to these to material and form within a circular economy model. |
| Materials investigation design  | Plans an investigation to test at least three materials against a single condition.  | Plans an investigation to test at least three materials against several conditions, including a risk assessment.  | Plans an investigation to test at least three materials against several conditions, including measures to ensure reliability of data and a risk assessment.  |
| Materials investigation conduct | Selects and uses equipment safely.  | Selects and uses appropriate equipment safely.  | Selects and uses appropriate equipment safely, systematically and accurately. |
| Materials investigation analysis and findings | Identifies trends in data and draws conclusions.  | Uses knowledge of scientific concepts to draw conclusions about observed trends that are consistent with evidence. | Uses knowledge of scientific concepts to draw conclusions about observed trends that are consistent with evidence and identifies possible areas for error in the method used.  |
| Prototype design  | The prototype shows how a ‘greener’ material could be used to a package a product.  | The prototype shows how a ‘greener’ material could be used to package, transport and market a product.  | The prototype shows how a ‘greener’ material can be used to improve packaging, transport and marketing of a product.  |
| Prototype Pitch  | The pitch explains how environmental considerations have informed the packaging design.  | The pitch explains how social, economic and environmental considerations have informed the packaging design.  | The pitch explains how emerging technologies can influence social, economic and environmental considerations to inform packaging design.  |